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Volume 64—Number 1—January 1971

BALCONY

JOURNAL

KLAHOMA STATE MEDICAL ASSOCIATION

71

Menrium® treats the menopausal symptoms that bother him most.



Roche
LABORATORIES
Division of Hoffmann-La Roche Inc.
Nutley, New Jersey 07110

. His wife has a lot of different menopausal symptoms, but only a few really irritate *him*. Her hot flashes, her vertigo, her palpitations—that's *her* problem. What really bothers him is her nervousness, her irritability and her excessive anxiety, often expressed by endless "book-shuffling, chain-smoking, reading-lamp" insomnia!

Menrium takes care of hot flashes, vertigo, palpitations in most menopausal women. Menrium provides the well-known antianxiety action of chlordiazepoxide (Librium®) and water-soluble esterified estrogens. It therefore relieves more symptoms than either component separately. It takes care of the vasomotor symptoms as well as the emotional symptoms. This means the symptoms that bother his wife most. And the symptoms that irritate him most.

So, to help them both get through *her* menopause, remember Menrium.



Before prescribing, please consult complete product information, a summary of which follows:

Indications: Management of manifestations generally associated with the menopausal syndrome—anxiety and tension, vasomotor complaints and hormonal deficiency states.

Contraindications: Women with cancer of breast or genitalia, except inoperable cases, and those with known hypersensitivity to chlordiazepoxide and/or esterified estrogens.

Warnings: Caution patients about possible combined effects with alcohol and other CNS depressants. As with all CNS-acting drugs, caution patients against hazardous occupations requiring complete mental alertness (*e.g.*, operating machinery, driving). Exclude other possible causes of menopausal syndrome manifestations, such as pregnancy. Though physical and psychological dependence have rarely been reported on recommended doses, use caution in administering to addiction-prone individuals or those who might increase dosage; withdrawal symptoms (including convulsions) similar to those seen with barbiturates have been reported following discontinuance of chlordiazepoxide HCl. Potential benefits of use in pregnancy, lactation or women of childbearing age should be weighed against possible hazards to mother and child. Clinical data inadequate on safety in pregnancy.

Precautions: In elderly and debilitated patients, limit dosage to smallest effective amount of chlordiazepoxide (initially 10 mg or less per day) to preclude ataxia or oversedation; increase gradually as needed and tolerated. Though generally not recommended, if combination therapy with other psychotropics seems indicated, carefully consider individual pharmacologic effects—particularly in use of potentiating drugs such as MAO inhibitors and phenothiazines. Observe usual precautions in patients with impaired renal or hepatic function. Paradoxical reactions to chlordiazepoxide (*e.g.*, excitement, stimulation and acute rage) have been reported in psychiatric patients. Employ usual precautions in the treatment of anxiety states with evidence of impending depression; suicidal tendencies may be present and protective measures necessary. Variable effects on blood coagulation very rarely reported in patients receiving Librium® (chlordiazepoxide) and oral anticoagulants.

Adverse Reactions: Untoward effects seen with either compound alone may occur with Menrium. With chlordiazepoxide, drowsiness, ataxia and confusion reported in some patients, particularly in the elderly and debilitated; while usually avoided by proper dosage adjustment, these are occasionally observed at lower dosage ranges. Also reported have been a few instances of syncope; isolated occurrences of skin eruptions, edema, minor menstrual irregularities, nausea and constipation, extrapyramidal symptoms, increased and decreased libido, and occasional reports of blood dyscrasias, including agranulocytosis, jaundice and hepatic dysfunction. Periodic blood counts and liver function tests advisable during protracted treatment. Changes in EEG patterns (low-voltage fast activity) observed during and after chlordiazepoxide treatment.

With estrogens, headache, nausea and vomiting, anorexia, gastrointestinal discomfort, dysuria and urinary frequency, jitteriness, breast engorgement, formation of breast cysts, skin rashes and pruritus occasionally seen. Administration may also be associated with uterine bleeding and/or followed by withdrawal bleeding.

Usual Dosage: One tablet t.i.d. for 21 days, followed by one-week rest periods.

Menrium® T.I.D.

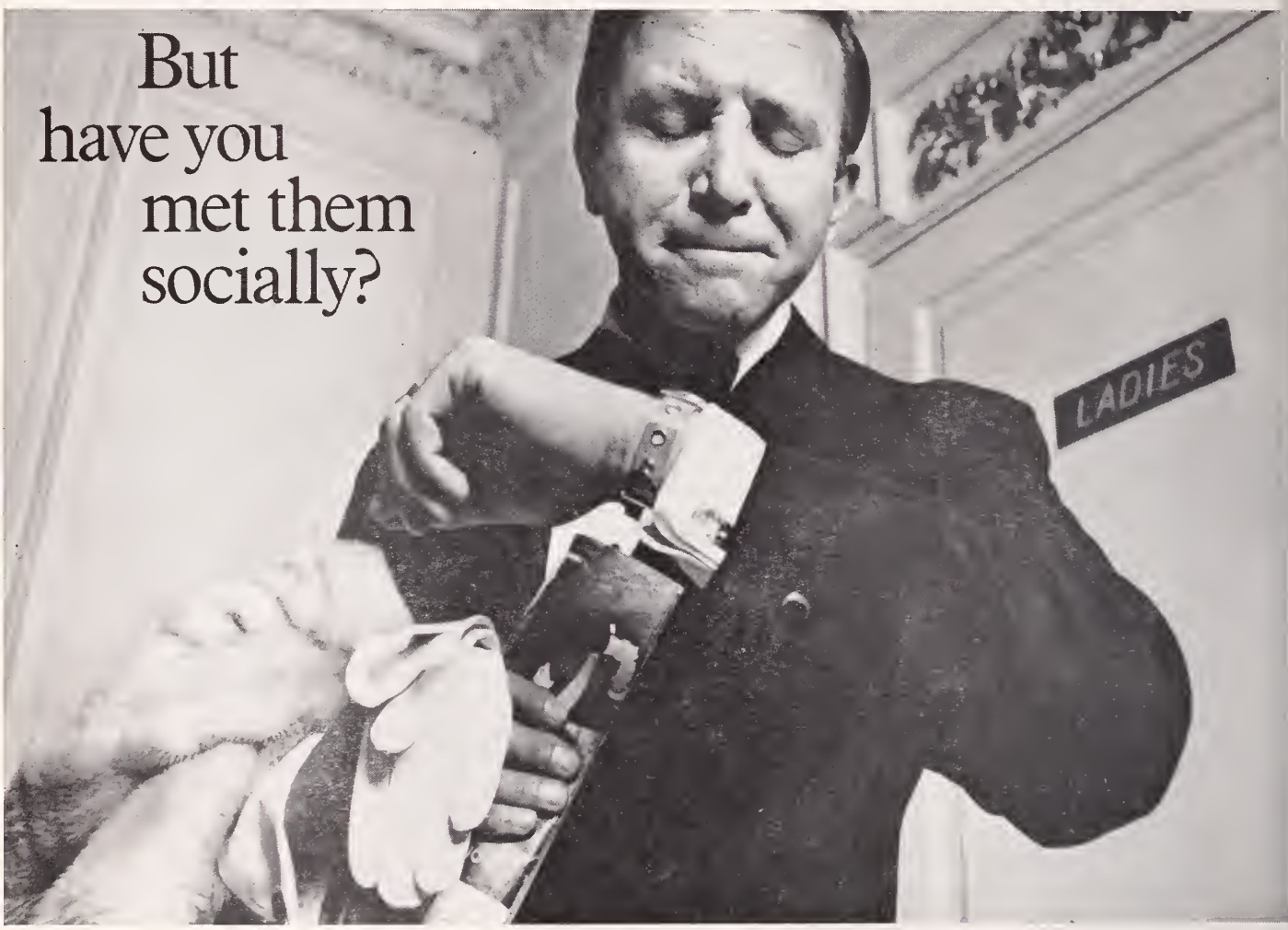
5 mg chlordiazepoxide	5-2	0.2 mg water-soluble esterified estrogens
5 mg chlordiazepoxide	5-4	0.4 mg water-soluble esterified estrogens
10 mg chlordiazepoxide	10-4	0.4 mg water-soluble esterified estrogens

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Long-acting Hygroton offers a gentle flow rather than abrupt diuresis.
It's smooth acting.
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Makes water, not waves.



Electrolyte imbalance may occur when using diuretics. Hygroton is contraindicated in severe renal or hepatic diseases and, of course, if it causes hypersensitivity. Carefully supervise those who may be receiving other antihypertensives.

Hygroton® chlorthalidone USP *Indications:* Hypertension and many types of edema involving retention of salt and water. *Contraindications:* Hypersensitivity and most cases of severe renal or hepatic diseases. *Warnings:* With the administration of enteric-coated potassium supplements, which should be used only when adequate dietary supplementation is not practical, the possibility of small-bowel lesions (obstruction, hemorrhage, and perforation) should be kept in mind. Surgery for these lesions has been required frequently and deaths have occurred. Discontinue enteric-coated potassium supplements immediately if abdominal pain, distention, nausea, vomiting, or gastrointestinal bleeding occur. Use with caution in pregnant women and nursing mothers since the drug crosses the placental barrier and appears in cord blood and since thiazides appear in breast milk. The drug may result in fetal or neonatal jaundice, thrombocytopenia, and possibly other adverse reactions which have occurred in the adult. When used in women of childbearing age, balance benefits of drug against possible hazards to fetus. *Precautions:* Antihypertensive therapy with this drug should always be initiated cautiously in postsympathectomy patients and in patients receiving ganglionic blocking agents, other potent antihypertensive drugs or curare. Reduce dosage of concomitant antihypertensive agents by at least one-half. Because of the possibility of progression of renal damage, periodic determination of the BUN is indicated. Discontinue if the BUN rises or liver dysfunction is aggravated. Hepatic coma may be precipitated. Electrolyte imbalance, sodium and/or potassium depletion may occur. If potassium depletion should occur during therapy, the drug should be discontinued and potassium supplements given, provided the patient does not have marked oliguria. Take special care in cirrhosis or severe ischemic heart disease and in patients receiving corticosteroids, ACTH, or digitalis. Salt restriction is not recommended. *Adverse Reactions:* Nausea, gastric irritation, vomiting, anorexia, constipation and cramping, dizziness, weakness, restlessness, hyperglycemia, glycosuria, hyperuricemia, headache, muscle cramps, orthostatic hypotension, which may be potentiated when chlorthalidone is combined with barbiturates, narcotics or alcohol, aplastic anemia, leukopenia, thrombocytopenia, agranulocytosis, impotence, dysuria, transient myopia, skin rashes, urticaria, purpura, necrotizing angiitis, acute gout, and pancreatitis when epigastric pain or unexplained G.I. symptoms develop after prolonged administration. Other reactions reported with this class of compounds include: jaundice, xanthopsia, paresthesia, and photosensitization. *Average Dosage:* 50 or 100 mg. with breakfast daily or 100 mg. every other day. *How Supplied:* White, single-scored tablets of 100 mg. and aqua tablets of 50 mg., in bottles of 100 and 1000. (B)46-230-G *For full details, please see the complete prescribing information.*

GEIGY Pharmaceuticals, Division of CIBA-GEIGY Corporation, Ardsley, New York 10502

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Gone with the wind

The gas/acid group of disorders

"The two most common complaints referable to the upper gastrointestinal tract for which patients seek medical relief are hyperacidity and 'gas.' The two often occur together."*

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SILAIN-GEL Tablets and Liquid are separate formulas designed to provide equivalent dual-action symptomatic relief. Both dosage forms contain simethicone which effectively frees trapped gas, enabling the patient to eliminate it. Magnesium hydroxide in both assures a rapid rise in pH for prompt relief of hyperacidity. The special co-dried aluminum hydroxide/magnesium carbonate gel in the tablets assures the same rapid and uniform reaction rate as the liquid. Thus, both medications achieve prompt and prolonged neutralization of free acid *plus* prompt relief from the pain and pressure of trapped gas.

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The pleasant, distinctive flavor of SILAIN-GEL, as well as its non-constipating feature, make it a therapy your patients can live with—in comfort and without complaint.

Select the form of SILAIN-GEL you want to provide symptomatic relief in: gastric ulcer • duodenal ulcer • heartburn • gastric hyperacidity • gastritis • dyspepsia

when the patient prefers the convenience of a tablet, select
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Also available for the patient who needs an antifrothicant/antiflatulent agent only: **Silain®** (simethicone) Tablets

*Slanger, A.: Med. Times *94*:150 (Feb.) 1966.

Announcing the "Antgasid"

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Tablets: simethicone plus aluminum hydroxide/magnesium carbonate co-dried gel and magnesium hydroxide
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one dose does both: frees captured gas...neutralizes free acid

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The actions of the official Tincture and Extract of Belladonna result chiefly from their Atropine content . . . conclude Goodman and Gilman

THE PHARMACOLOGICAL BASIS OF THERAPEUTICS
3rd Edition, page 522



ANTROCOL®

Antrocol provides the prompt, predictable antisecretory action of the belladonna alkaloid, atropine, fortified with sedation and blended with Bensulfoid, contributing to even absorption.



Each tablet or capsule contains: Atropine sulfate, 0.324 mg.; Phenobarbital, 16 mg. (may be habit forming); Bensulfoid, 65 mg. (see white section PDR). The atropine content of Antrocol is the maximum amount the average patient can take at six hour intervals over long periods with comfort.

SUPPLIED
Tablet in bottles of 100, 500 and 5000
Capsule in bottles of 100, 500 and 1000

Caution: Federal law prohibits dispensing without prescription.

PRESCRIBING INFORMATION

Contraindicated in glaucoma. Use cautiously in prostatic hypertrophy. Side-effects of toxic dose of atropine: flushing, dryness of mouth, cycloplegia, tachycardia and urinary retention.

DOSAGE: One tablet or capsule after each meal to correct emotional stress and normalize gastric secretions. In treating peptic ulcer, doses at regular intervals up to eight (8) tablets or capsules per day to provide the proper gastric titer for healing. After ulcer has healed, one tablet or capsule after each meal to maintain a titer unfavorable to recurrence.

Clinical supply available to physicians.

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The girth control pill



Tepanil® Ten-tab

(continuous release form)

(diethylpropion hydrochloride)

works on the appetite not on the 'nerves'

When girth gets out of control, TEPANIL can provide sound support for the weight control program you recommend. TEPANIL reduces the appetite—patients enjoy food but eat less. Weight loss is significant—gradual—yet there is a relatively low incidence of CNS stimulation.

Contraindications: Concurrently with MAO inhibitors, in patients hypersensitive to this drug; in emotionally unstable patients susceptible to drug abuse.

Warning: Although generally safer than the amphetamines, use with great caution in patients with severe hypertension or severe cardiovascular disease. Do not use during first trimester of pregnancy unless potential benefits outweigh potential risks.

Adverse Reactions: Rarely severe enough to require discontinuation of therapy, unpleasant symptoms with diethylpropion hydrochloride have been reported to occur in relatively low incidence. As is characteristic of sympathomimetic agents, it may occasionally cause CNS effects such as insomnia, nervousness, dizziness, anxiety, and jitteriness. In contrast, CNS depression has been reported. In a few epileptics an increase in convulsive episodes has been reported. Sympathomimetic cardiovascular effects reported include ones such as tachycardia, precordial pain, arrhythmia, palpitation, and increased blood pressure. One published report described T-wave changes in the ECG of a healthy young male after ingestion of diethylpropion hydrochloride; this was an isolated experience, which has not been reported by others. Allergic phenomena reported include such conditions as rash, urticaria, ecchymosis, and erythema. Gastrointestinal effects such as diarrhea, constipation, nausea, vomiting, and abdominal discomfort have been reported. Specific reports on the hematopoietic system include two each of bone marrow depression, agranulocytosis, and leukopenia. A variety of miscellaneous adverse reactions have been reported by physicians. These include complaints such as dry mouth, headache, dyspnea, menstrual upset, hair loss, muscle pain, decreased libido, dysuria, and polyuria.

Convenience of two dosage forms: TEPANIL Ten-tab tablets: One 75 mg. tablet daily, swallowed whole, in midmorning (10 a.m.); TEPANIL: One 25 mg. tablet three times daily, one hour before meals. If desired, an additional tablet may be given in midevening to overcome night hunger. Use in children under 12 years of age is not recommended.

T-006A / 1/70 / U.S. PATENT NO. 3,001,910

THE NATIONAL DRUG COMPANY
DIVISION OF RICHARDSON-MERRELL INC
PHILADELPHIA, PENNSYLVANIA 19144



Painful night leg cramps...

unwelcome bedfellow for any patient– including those with arthritis, diabetes or PVD

One thing patients can sleep without, particularly patients with chronic disease conditions such as arthritis, diabetes or PVD, is painful night leg cramps. Although seldom the presenting complaint, night leg cramps can tie your patients up in painful knots. Now, just one tablet of QUINAMM at bedtime can usually bring an end to shattered sleep and needless suffering. Your patients will sleep restfully—gratefully—with QUINAMM, specific therapy to prevent painful night leg cramps.

Prescribing Information—Composition: Each white, beveled, compressed tablet contains: Quinine sulfate, 260 mg., Aminophylline, 195 mg. **Indications:** For the prevention and treatment of nocturnal and recumbency leg muscle cramps, including those associated with arthritis, diabetes, varicose veins, thrombophlebitis, arteriosclerosis and static foot deformities. **Contraindications:** QUINAMM is contraindicated in pregnancy because of its quinine content. **Precautions/Adverse Reactions:** Aminophylline may produce intestinal cramps in some instances, and quinine may produce symptoms of cinchonism, such as tinnitus, dizziness, and gastrointestinal disturbance. Discontinue use if ringing in the ears, deafness, skin rash, or visual disturbances occur. **Dosage:** One tablet upon retiring. Where necessary, dosage may be increased to one tablet following the evening meal and one tablet upon retiring. **Supplied:** Bottles of 100 and 500 tablets.

THE NATIONAL DRUG COMPANY
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Quinamm™
(quinine sulfate 260 mg., aminophylline 195 mg.)

Specific therapy for night leg cramps

0915A 1/70

A once-popular treatment for back pains was to have the seventh son of a seventh son stand or walk on the patient's back.





The pain of earache was allegedly relieved by holding a hot roasted onion to the ear.

For headache, a sovereign remedy was to wear a snakeskin round one's head.



A realistic approach to pain relief



Empirin'®

Compound with Codeine Phosphate gr. 1/2 No. 3

Each tablet contains:
Codeine Phosphate gr. 1/2 (Warning—May be habit forming), Phenacetin gr. 2 1/2, Aspirin gr. 3 1/2, Caffeine gr. 1/2.

keeps the promise of pain relief

'B.W. & Co.' narcotic products are Class "B", and as such are available on oral prescription, where State law permits.

BURROUGHS WELLCOME & CO. (U.S.A.) INC.
Tuckahoe, N.Y.

Now that there's a greater therapeutic potential for treating Parkinson's disease and syndrome

...the information on these pages will be of practical interest to you

Larodopa® (levodopa) Roche : therapy that demands slow, individualized dosage titration

With the advent of new Larodopa (levodopa), there is now an agent that holds promise of relief of all the major symptoms of Parkinson's disease and syndrome—rigidity and akinesia as well as tremor.

However, as has been reported in the medical literature, levodopa demands slow, careful titration of dosage, and frequent patient monitoring. Adverse reactions may occur at any time, some serious enough to require dosage reduction or discontinuance of therapy. Thus, before prescribing, it is particularly important to refer to the following Important Therapeutic Considerations, the sections covering dosage and administration, and to the information on monitoring the patient (see prescribing information).

Important Therapeutic Considerations

Larodopa (levodopa) is an unusual drug which must be administered with particular care. In view of its high incidence of adverse reactions, you will find the following therapeutic considerations for Larodopa important:

(a) Larodopa is not curative and its mechanism of action is unknown, though postulated.

(b) Long-term safety and efficacy for Larodopa have not been established.

(c) Accurate diagnosis is imperative since there is no evidence that Larodopa is effective in neurological diseases other than Parkinson's disease and syndrome.

(d) About one-third of patients or more will not experience clinical improvement on Larodopa, and virtually 100% of patients will experience side effects of some degree.

(e) The dose of Larodopa producing maximal improvement with tolerated side effects must be *carefully titrated for the individual patient.*

(f) Finally, there is no evidence that early treatment with Larodopa, while possibly controlling symptomatology, alters the course of the disease.





Photographs of patients treated with Larodopa by permission of the patients.

Guide to dosage and administration of Larodopa® (levodopa) Roche

Usual daily dosage—initially, 0.5 to 1 Gm daily (divided in 2 or more doses with food).

Total daily dosage—increased gradually in increments of 0.125 to 0.75 Gm every 2 or 3 days, as tolerated.

Usual daily dose range—from 4 to 6 Gm given orally in 3 or more divided doses, with food.

Daily dosage should NOT exceed 8 Gm.

Optimal therapeutic dosage—usually reached in 6 to 8 weeks.

Establishing optimal dosage—must be determined and *carefully titrated for the individual*—gradually increase dosage until: (1) maximal response is seen, or (2) maximum recommended dosage is reached, or (3) side effects preclude further dosage increase, or require reduction or discontinuation of dosage.

Interrupted therapy—after brief interruption, dosage should again be adjusted gradually. (In many cases, the patient can be rapidly titrated to his previous therapeutic dosage. See "Precautions" section of Complete Prescribing Information.)

To underscore the extreme importance of careful dosage titration, the following week-by-week dosage pattern has been prepared, based on the assumption that the course of therapy is uninterrupted by any complications requiring a change in dosage. (Again, dosage must be reduced when intolerable side effects occur.)

Because it is absolutely imperative that Larodopa therapy be individualized to meet the particular needs of each patient, the following dosage schedule should be considered only a model.

Larodopa®
levodopa/Roche

Titration of Larodopa (levodopa) dosage in patient evaluated weekly

Intervals	0.25 Gm Tablets	0.5 Gm Tablets	Total Daily Dose
Week 1	½ tab (0.125 Gm) *q.i.d.* w/ food		0.5 Gm
Week 2	1 tab (0.25 Gm) *q.i.d.* w/ food		1.0 Gm
Week 3	1½ tab (0.375 Gm) *q.i.d.* w/ food		1.5 Gm
Week 4		1 tab (0.5 Gm) *q.i.d.* w/ food	2.0 Gm
Week 5		1½ tab (0.750 Gm) at breakfast and dinner. 1 tab (0.5 Gm) at lunch and bedtime	2.5 Gm
Week 6		1½ tab (0.750 Gm) *q.i.d.* w/ food	3.0 Gm
Week 7		2 tab (1.0 Gm) at breakfast and dinner. 1½ tab (0.750 Gm) at lunch and bedtime	3.5 Gm
Week 8		2 tab (1.0 Gm) *q.i.d.* w/ food	4.0 Gm

The daily maintenance dosage in the above example may be increased, decreased, or maintained at the 4 Gm level depending upon the point at which optimal therapeutic results are achieved.

Concurrent therapies: Larodopa (levodopa) may be used concomitantly with other antiparkinsonism drugs such as benztropine mesylate (Cogentin), trihexyphenidyl HCl (Artane) or procyclidine HCl (Kemadrin), but when more than one drug is used, the usual dose of each may have to be reduced.

Not to be given concomitantly: MAO inhibitors. Such agents must be discontinued two weeks prior to initiating Larodopa therapy.

Note of caution for patients who require vitamin supplementation: It has been reported that pyridoxine HCl (vitamin B_6) can rapidly reverse the antiparkinson effects of levodopa therapy.

A timetable for monitoring

While it cannot be emphasized too strongly that each patient on Larodopa must be treated as a totally *distinct* entity, the following are suggested as guidelines in the monitoring of such patients.

1. For the first month, at least: the average ambulatory outpatient should be seen and evaluated a minimum of *once a week.*

2. During the second month: patient evaluations can be extended to *every two weeks* (assuming no laboratory abnormalities or intolerable side effects have occurred).

3. From the third through the sixth month: the patient should be evaluated *once a month.*

4. After six months on the appropriate maintenance dose: with no significant adverse reactions or laboratory abnormalities, the patient should be seen at least *once every two months.*

5. Finally, after one year on maintenance dosage: evaluation should be made no less than *once every three months.*

Therapeutic response

A favorable response may often be seen within 10 days to several weeks. However, a patient should not be taken off a tolerable dose—even in the absence of a response—until six months have elapsed. This is because, in some instances, the response may come relatively late. Of course, any serious laboratory abnormalities or intolerable side effects automatically dictate discontinuance of therapy.

Lessening the side-effects problem

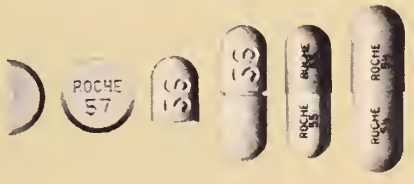
While it is generally advisable that levodopa be taken after meals, nausea and vomiting, two frequently occurring side effects of levodopa, can often be minimized by taking medication with foods. If nausea becomes intolerable, the dosage should be cut back in daily decrements equal to the most recent increments given the patient. This reduction is to be spaced over two- or three-day intervals. Conversely, as nausea subsides, the drug dosage should be slowly increased in like increments.

An important part of the routine monitoring procedure would be to determine any possible cardiovascular problems. If cardiac arrhythmias occur, Larodopa should be discontinued and other antiparkinson therapy instituted.

With orthostatic hypotension a possibility, checking the patient's blood pressure (both supine and standing) is essential.

If choreiform movements appear, they usually occur when maximum therapeutic dosages are reached. To control such effects, reduce dosage by decrements of 0.5 Gm daily.

Flexible dosage: scored tablets of 0.25 Gm and 0.5 Gm help simplify dosage titration



Conveniently scored 0.25 and 0.5 Gm tablets make possible more precise titration. Should another dosage form be preferred, Larodopa is also supplied in capsule strengths of 0.25 and 0.5 Gm.

Before prescribing, please consult product information on next page. →

Larodopa®
levodopa/Roche

For the relief of symptoms associated with Parkinson's disease and syndrome

Before prescribing, please consult complete product information, a summary of which follows:

BECAUSE OF THE HIGH INCIDENCE OF ADVERSE REACTIONS AND THE NECESSITY FOR INDIVIDUALIZING THERAPY, THE PHYSICIAN SHOULD THOROUGHLY FAMILIARIZE HIMSELF WITH THE INFORMATION IN THE PACKAGE INSERT BEFORE INSTITUTING THERAPY WITH LARODOPA (LEVODOPA). ACCURATE DIAGNOSIS IS IMPERATIVE BECAUSE EVIDENCE IS LACKING THAT LARODOPA IS EFFECTIVE IN NEUROLOGICAL DISEASES OTHER THAN PARKINSON'S DISEASE AND SYNDROME.

ADEQUATE CLINICAL AND LABORATORY FACILITIES SHOULD BE AVAILABLE FOR PROPER MONITORING OF TREATMENT.

THE LONG-TERM SAFETY AND EFFICACY OF LARODOPA HAVE NOT BEEN ESTABLISHED.

Indications: For the treatment of Parkinson's disease and syndrome. Useful in relieving many of the symptoms, particularly rigidity and bradykinesia; frequently helpful in management of associated tremor, dysphagia, sialorrhea and postural instability.

Contraindications: In patients for whom a sympathomimetic amine is contraindicated; in patients receiving MAO inhibitors (the latter should be discontinued two weeks prior to initiating therapy with Larodopa); in patients with clinical or laboratory evidence of uncompensated endocrine, renal, hepatic, cardiovascular or pulmonary disease; with narrow angle glaucoma and blood dyscrasias; in patients with known hypersensitivity to levodopa.



Warnings: Long-term safety and efficacy not established. Administer with extreme caution to patients with bronchial asthma or emphysema who may require sympathomimetic drugs; to those with active peptic ulcer (in facilities equipped to treat gastrointestinal hemorrhage) : in patients with psychoses or severe psychoneuroses. Initiate therapy with extreme caution and in proper treatment facility in patients with a history of myocardial infarction who have residual atrial, nodal or ventricular arrhythmias. Monitor all patients for development of mental changes, depression with suicidal tendencies, other serious antisocial behavior. Carefully consider concomitant administration of pyridoxine hydrochloride (vitamin B_6); oral doses of 10 to 25 mg have been reported to rapidly reverse the antiparkinson effects of Larodopa. In pregnancy, weigh potential benefits against possible hazards. Do not use in nursing mothers. Safety of Larodopa in children under age 12 not established.

Precautions: During extended therapy, periodic evaluations of hepatic, hematopoietic, cardiovascular and renal function recommended. In diabetic patients, control may be adversely affected; careful, frequent monitoring and proper adjustment of antidiabetic regimen required. Patients with chronic wide angle glaucoma may be treated cautiously provided intraocular pressure is well controlled and patient is monitored carefully. Monitor carefully patients receiving antihypertensive agents or psychoactive drugs concomitantly, or those with history of convulsions. If general anesthesia is required, discontinue Larodopa 24 hours prior to surgery; monitor cardiorespiratory functions carefully. Patients who improve on Larodopa therapy should resume normal activities cautiously. May be used concomitantly with other antiparkinson drugs with possible reduction in dosage of each.

Adverse Reactions: *Most frequently occurring:* nausea, anorexia, emesis, cardiac irregularities, orthostatic hypotension; choreiform, dystonic and other adventitious movements; dizziness, sedation, dyskinesia; psychiatric symptoms such as agitation, anxiety, confusion, depression, hallucinations, delusions, insomnia, nightmares, and mental changes including paranoid ideation and psychotic episodes. *Less frequently occurring* and listed according to system: *psychiatric*—suicidal tendencies, increased libido with serious antisocial behavior, euphoria, lethargy, stimulation, fatigue and malaise, dementia; *neurological*—ataxia, convulsions, faintness, impairment of gait, headache, increased hand tremor, akinetic episodes, torticollis, trismus, oculogyric crisis, weakness, numbness, bruxism; *gastrointestinal*—constipation, diarrhea, epigastric and abdominal distress and pain, flatulence, eructation, hiccups, sialorrhea, difficulty in swallowing, bitter taste, dry mouth, tightness of mouth, lips or tongue, duodenal ulcer, gastrointestinal bleeding, burning sensation of the tongue; *cardiovascular*—nonspecific ECG changes, palpitations, hypertension, flushing, phlebitis; *hematological*—hemolytic anemia (1 case); *dermatological*—sweating, edema, hair loss, pallor, rash, bad odor; *musculoskeletal*—low back pain, muscle spasm and twitching, blepharospasm, musculoskeletal pain; *respiratory*—feeling of pressure in the chest, cough, hoarseness, bizarre breathing pattern, postnasal drip; *urogenital*—urinary frequency, retention, incontinence, hematuria, nocturia, and one report of interstitial nephritis; *special senses*—blurred vision, diplopia, dilated pupils, activation of latent Horner's syndrome; *other*—fever, hot flashes, weight gain or weight loss.

Nausea, anorexia and vomiting usually obviated by temporary dosage reduction and/or administration with food. If cardiac arrhythmias occur, discontinue and institute other antiparkinson therapy. Reduce dosage when involuntary movements occur.

The following have been noted: elevation of BUN, SGOT, SGPT, LDH, bilirubin, alkaline phosphatase or PBI; occasionally, reductions in WBC, hemoglobin and hematocrit; elevations of uric acid with use of colorimetric method but not with uricase; rarely, positive Coombs test; dark sweat and urine.

Dosage and Administration: Because of the strong possibility of adverse reactions and the necessity for individualizing therapy, the physician should thoroughly familiarize himself with the information in the package insert before instituting therapy.

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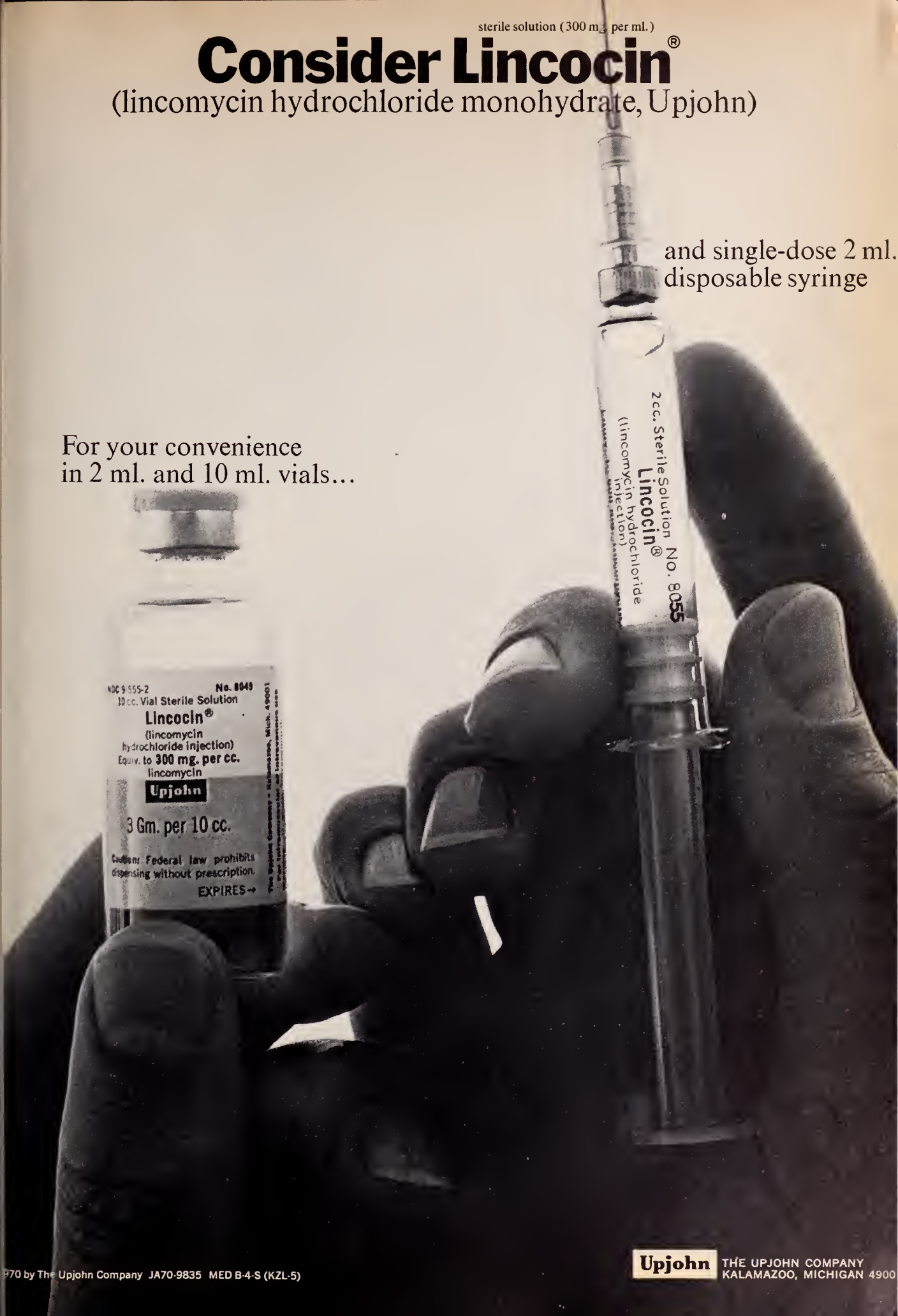
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AMONG THE MANY things which physicians are asked to do which have nothing to do with medical care, the life insurance questionnaire is one of the most objectionable. Pretending to be requested in the best interests of the patieint, it is rarely the patient who benefits from the information submitted. Certainly the physician never benefits, and the relationship between the patient and the physician frequently is strained by the unpredictable and sometimes inexplicable action of the insurance company.

Most standard inquiries ask for a complete and detailed summary of pertinent clinical records. We are asked to record the date of each consultation, the symptoms and complaints, the physical findings, the results of all laboratory, x-ray and diagnostic studies, the diagnoses, treatments and results of such treatments for each visit. It takes little imagination to estimate the great amount of time required to provide these data in the case of a patient who has been seen three or four times a year for eight, ten or twelve years.

Once completed, each report must be signed by the physician who in so doing, certifies that the information is *true* and *complete* and accurate. Thus, the life insurance company questionnaire becomes something more than a case summary; it becomes a legal document which affixes its signer with a real and potentially heavy liability involving both the insurance company and the patient.

Understandably but without justification, many patients hold their physicians responsible when their life insurance policy applications are declined or rated at higher premium levels. On more than rare occasions, a patient actually will be told by the policy salesman that the medical report submitted by his physician caused the company to refuse the policy. When true, such a revelation can irreparably damage the sometimes delicate patient-physician relationship and actually may aggravate the patient's symptoms and illness. When untrue . . . the allegation that the physician's report was the cause of the rejection constitutes a slander which can never be exposed or proved. Furthermore, the patient can believe only that his physician is withholding ominous information from him, careless in his record keeping, or maliciuosly lying. His lingering doubts will forever impair the patient's confidence in his physician.

For all of this time, all of this work; for all of this liability and all of this jeopardy, the physician can expect to be paid three to five dollars. An occasional company, in an uncommon display of reckless generosity may allow "up to ten dollars" for the completion of a "difficult or complicated" report. The information contained in a detailed case summary may have cost hundreds of dollars to obtain. If, as is sometimes true, the patient has not paid his account, the physician who gives the information to an insurance company is making a charitable contribution to a profit making institution.

As physicians, we do not make life insurance available or unavailable to our patients. This is the business of insurance companies and it is *their* best interests we serve by responding to their requests for information about our patients. The time we spend completing their detailed, legalistic forms must be subtracted from the time we can spend with our patients and there are far too many such subtractions already.

We can ill afford to subsidize the life insurance industry with charitable contributions of money and time. If they want information about our patients let them train and send investigators to review the clinical records. Let them obtain the patients' informed consent to *read* their records. Let them pay for the time and trouble involved in obtaining case summaries. Let them openly assume the sole and total responsibility for their actions. We should not share this responsibility or assume any resulting liability.

Personally, I would much prefer not to be offered the three dollars. *MRJ* □



Somerset Maugham in his book *Of Human Bondage* legibly illustrates a medical student's intellect and emotions wrongfully grouped. The Apostle Paul in his writings spoke of Soul and Spirit untenably held. Harriet Beecher Stowe in Uncle Tom's Cabin depicts the terrible evil of physical force. Human bondage in any form, be it emotional, spiritual, physical or professional is unthinkable.

We are approaching an era where professional bondage is occurring. Contemplate if you will government action against Canadian physicians only recently. It could happen here if we are not careful. Socialism is striding our land like a colossus, until presently our pursuit of life, liberty and happiness seems another prerogative.

American physicians constitute in present terms, a minority group—of sheer numbers we are no great manpower force, yet no single group of men in this nation's history have guided policy like ours. We have practiced and helped preserve initiative, enterprise, independence and democracy. Now in a great era of anti-discrimination, no other group or profession is required to serve at a fraction of the prevailing pay scale as ours.

The bureaucrat purposefully lies to Congress and the people concerning the cost of health care for the aged. He carefully instructs the recipients as to their rightful benefits and stands agast when such is not deliverable. This almost corrupt practice I deem as discriminatory against my profession.

Now let us once again try to predict what the new Congress has in mind for us. The Medicare-Medicaid Social Security Bill, which bogged down in the Senate's impasse over the controversial trade bill, has fallen prey to the expiration of time along with the important peer review provisions. As a ranking member of the Senate Finance Committee told Georgia physicians recently, "the Bennett Amendment did, after all, pass the Finance Committee unanimously . . . it might then be safe to assume its basic concept will be around in the new Congress." The Social Security Administration undoubtedly will report that tighter screening procedures helped brake the soaring cost of the Medicare program, so we can expect further cuts in our professional fees and closer scrutiny of our utilization of federally financed health programs.

Your Planning Committee, aided by other informed and interested physicians have met on several occasions to update our knowledge of how we might implement peer review and utilization control if and when it might suddenly be thrust upon us. We plan to keep you informed of our progress by visiting as many of the county societies as possible, as well as through *The Journal* and *Newsletter*. We solicit your suggestions and urge your participation in this most important task. □

Sincerely and fraternally,

E. L. Calhoon M.D.

OSMA JOURNAL/scientific

Insulinomas: Evaluation and Treatment

JAMES M. HARTSUCK, M.D.

Modern endocrine function tests have increased the diagnostic accuracy of insulinomas and thereby have influenced the surgical approach for the obscure lesion.

ISLET CELL TUMORS usually present with neurologic symptoms. Early diagnosis is essential to prevent irreversible central nervous system damage. Modern endocrine function tests make the preoperative diagnosis more certain; therefore, a more exhaustive search at the initial operation is indicated.

In 1922, Banting and Best introduced pancreatic extracts in the treatment of diabetes mellitus.[1] Soon afterwards, the clinical syndrome of hypoglycemia with initial hunger, tremulousness, and weakness followed by sweating, tachycardia, confusion, and finally coma was described.[5] Seven years later Roscoe Graham successfully removed a benign insulinoma.[7] In 1938, after an extensive personal experience with these unusual tumors, Whipple described a clinical triad which included 1) hypoglycemic symptoms with fasting, 2) concomitant blood sugar levels below 50 mg.%, and 3) relief of the symptoms and hypoglycemia by the ingestion of glucose. This clinical triad has stood the test of time and will correctly indicate the majority of patients with insulinomas.

Today more specific endocrine function tests are available and allow greater precision of diagnosis. These tests include intravenous tolbutamide tolerance tests,[4] fasting serum insulin levels, and insulin stimulation tests using sulfonylureas.[6, 9, 12] Because of greater assurance of diagnosis, an aggressive surgical approach with intraoperative monitoring of blood glucose is justified for the patient with a nonpalpable islet cell adenoma. Review of the patients with the diagnosis of insulinoma at the University of Oklahoma Medical Center emphasizes the difficulties in diagnosis and the need for recovery of an insulinoma at the first operation.

CASE REPORTS

Case No. 1. The patient (H.P., U.H., #22-64-38), an 18-year-old white female, was admitted in coma with a three month history of morning syncope and seizures. The admission blood sugar was 36 mg.%. She awakened after administration of 50 percent intravenous glucose. She was not obese but had gained 20 pounds in the past 18 months. Physical examination: The patient presented in coma with hypoactive reflexes. After resuscitation with glucose and following diagnostic studies, she underwent

exploratory laparotomy. No abnormalities of the pancreas were found. A two cm. nodule adjacent to the jejunum was removed; it proved to be aberrant pancreas. A blind resection of the distal pancreas including the tail and body was done without recovery of a tumor. Postoperative blood sugars remained low and a fasting blood sugar six days postoperative was 50 mg.%. The patient was discharged on a high carbohydrate diet. She continued to have morning syncopal episodes, despite nocturnal feedings. She was intermittently confused and mental deterioration was observed. Six months later she was readmitted and a fasting blood sugar was 31 mg.%. At laparotomy no tumor was demonstrable and the patient underwent resection of the head and uncinate process with preservation of a small rim of pancreas adjacent to the duodenum. A one cm. well incapsulated islet cell tumor which was imbedded in the pancreatic head adjacent to the duodenal sweep was found. Postoperatively, the blood sugar increased to 312 mg.% and the postoperative course was uneventful. The patient was discharged and maintained on 50 units of NPH insulin per day. Her mental acuity has not returned to the pre-illness level in the opinion of her physician observers.

Comment: The patient illustrates the difficulty in locating insulinomas at the time of surgery. The operations were performed in 1955, five years before insulin assays became available. With a more definite preoperative diagnosis and intraoperative monitoring of blood sugar, the adenoma might have been recovered initially and months of damaging hypoglycemia prevented.

Case No. 2. The patient (J.H., U.H., #30-51-54), an 18-year-old male admitted in 1960 with a seven month history of dizzy spells and syncope following exercise. He demonstrated amazing insight into his illness by changing his occupation from trimming trees to tending a bee hive and gathering honey. On one occasion following prolonged exercise he had syncope with seizures. Blood glucose at that time was 24 mg.%. He awakened immediately with intravenous glucose. A recent weight gain of 15 pounds was noted. Physical examination: He was somnolent, dull, and slightly obese. Repeated fasting blood sugars were 30 and 35 mg.%. At laparotomy, a two cm. adenoma in the tail of the pancreas was demonstrated and enucleated. The postoperative course was complicated by fever, pain in the left flank, and shoulder tip reference pain. Left diaphragmatic excursions were diminished. On the twelfth postoperative day he underwent drainage of a lesser sac abscess. Four weeks later he was discharged and has remained well.

Comment: Postoperative fever, abscess, and pseudocyst are common after pancreatic surgery. In this patient a lesser sac abscess occurred despite drainage after an uncomplicated enucleation of the adenoma.

Case No. 3. The patient (R.L., U.H., #31-85-41), a 50-year-old white female, was admitted with the chief complaint of morning blackout spells. Blood sugars during these episodes were as low as 28 mg.%. She was tremendously obese. Fasting symptoms as well as hypoglycemia were relieved by oral glucose ingestion. At laparotomy, no tumor could be identified; therefore, blind distal pancreatectomy was performed. Two separate lesions were recovered; a two cm. adenoma from the tail and a one cm. adenoma from the body. The blood sugar immediately following the surgery rose to 224 mg.%. The postoperative course was complicated by fever, but the patient was discharged on the 19th postoperative day and has remained well.

Comment: Gross examination of the resected pancreas demonstrated the tumors. The rapid response in blood sugar gave additional proof of the complete removal of the functioning beta cell tumors. Since multiple adenomas occur in approximately ten percent of patients with insulinomas, intraoperative blood glucose monitoring is recommended.

Case No. 4. The patient (F.D., U.H., #34-65-49), is a 32-year-old male who was referred to the University Hospital in coma. He had a three year history of seizures and irrational behavior. The admission blood sugar was 22 mg.%. Continuous intravenous glucose administration elevated the blood sugar to 48 mg.% and consciousness was

slowly regained. The patient had undergone mental deterioration over the past three years. Previously he had been evaluated for seizures and placed on phenobarbital and "Dilantin." Physical examination: He was slender. Mental state was described as dull. The patient underwent laparotomy. No tumor was demonstrated; therefore, a partial pancreatectomy and splenectomy were performed. Postoperatively, no tumor was demonstrated by pathologic examination and fasting blood sugars remained depressed, 29 and 33 mg.%. Two months later because of continued hypoglycemic symptoms, the patient underwent exploration. At this time a two cm. islet cell adenoma was recovered at the junction at the head and neck of the pancreas. The adenoma was embedded deeply in the substance of the gland but enucleation was possible without damage to the common bile duct. The postoperative blood sugar rose to 330 mg.%. The postoperative course was complicated by a spontaneous left pneumothorax and moderate wound drainage. He was discharged on the eighteenth postoperative day. Unfortunately, he has not regained his pre-illness mental acuity.

Comment: This patient emphasizes the importance of considering insulinoma in the differential diagnosis of all patients with seizures to prevent irreversible central nervous system damage from hypoglycemia. Again, intraoperative blood glucose measurement and a more aggressive surgical approach were indicated initially.

Case No. 5. The patient (A.A., OMRF, #21-77), a 55-year-old male, entered with a five year history of episodic morning unresponsiveness. He had been treated with "Dilantin" for seizures. His wife noted relief of seizures by feeding, especially in the morning. A fasting blood sugar taken at the time of symptoms was 38 mg.%. The patient was referred to the Oklahoma Medical Research Foundation with the diagnosis of probable insulinoma. Fasting blood sugar was noted to be 22 mg.% and serum insulin levels were elevated to approximately four times the upper limit of normal on multiple occasions. He was treated with diazoxide, chlorothiazide, and a low sodium diet. Diazoxide was noted to raise the fasting blood sugar to above 67 mg.%, and to decrease the fasting serum insulin levels to slightly above normal. Intravenous glucose produced a prolonged and marked hypoglycemia. The patient was not obese. Physical examination was not remarkable. In January 1967, he underwent laparotomy with enucleation of a three cm. reddish-brown adenoma from the superior border of the pancreas. The postoperative course was uneventful. Tissue analysis of the adenoma revealed 25.8 units of insulin per gram. Normal pancreas usually contains one to four units of insulin per gram of wet gland.

Case No. 6. The patient (A.K., V.A.H., #517-20-96-67) first noted hypoglycemic symptoms with convulsions in 1963. He underwent subtotal pancreatectomy at another hospital and was found to have a benign adenoma. He was asymptomatic until October of 1968, when he developed hypoglycemic symptoms and underwent partial pancreatectomy with removal of the remainder of the body of the pancreas. No tumor was demonstrable by pathologic examination and hypoglycemic symptoms persisted postoperatively. He again was explored, but further pancreatic resection was abandoned because of a lesser sac abscess which was drained. He was treated with diazoxide which was useful in controlling hypoglycemia, but precipitated congestive heart failure necessitating diuretics and salt restriction. In March of 1969 he was admitted to the Veterans Administration Hospital at the University of Oklahoma Medical Center and after evaluation for continued hypoglycemia, underwent a pancreaticoduodenectomy. Again no tumor was present in the specimen and the patient has continued to have fasting hypoglycemia with blood sugars as low as 33 mg.%. No other tumor was noted at the time of laparotomy. However, a liver scan postoperatively suggests a metastatic lesion deep in the right lobe of the liver. Presently he is managed with diazoxide, diuretics, dig-

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A 1962 graduate of Harvard Medical School, James M. Hartsuck, M.D., is certified by the American Board of Surgery and Thoracic Surgery. He is presently Assistant Professor of Surgery at the University of Oklahoma School of Medicine. He is a member of the Alpha Omega Alpha.

italis, and pancreatic enzyme replacement. Fasting serum insulin levels are markedly elevated.

Comment: Although it is quite common for islet cell tumors, which appear malignant by cytologic criteria to behave in a benign fashion, the converse is rare. The fact that this patient has continued elevated insulin levels virtually excludes the possibility of hypoglycemia secondary to a hepatoma or mesenchymal tumor. In all probability, he has a metastatic islet cell carcinoma which is functioning.

PREOPERATIVE EVALUATION

The fact that all six of the University of Oklahoma Medical Center patients presented with neurologic symptoms, usually morning seizures, is typical. Delayed diagnosis can cause significant and irreversible mental deterioration which occurred in cases one and four. All patients demonstrated a positive Whipple triad with a fasting blood sugar below 40 mg.%. Thus, the most important factor in diagnosis is a high index of suspicion in the patient with morning syncope and fasting seizures. A blood sugar drawn at the time of seizures was diagnostic in all of these cases. The differential diagnosis of hypoglycemia must include pituitary, adrenal, and hepatic insufficiency as well as reactive hypoglycemia. For the evaluation of the hypoglycemic patient, the following tests are recommended.

Prolonged fasting: A twelve hour fast is insufficient to rule out hypoglycemia.[10] However, nearly all of the patients with insulinomas will demonstrate marked hypoglycemia if the fast is carried to 72 hours. This test is especially useful in differentiating reactive hypoglycemia from insulinomas. It cannot exclude cirrhosis with depleted liver glycogen supplies or noninsulin producing mesenchymal or hepatic tumors. It can be dangerous if the patient is not carefully monitored for low blood sugar levels.

Serum insulin determination: An elevated fasting serum insulin level was demonstrated in the last two patients and is virtually diagnostic of an insulinoma. Serum insulin levels cannot differentiate an adenoma from an islet cell carcinoma, but can, if markedly elevated, usually differentiate an insulinoma from mesenchymal or hepatic tumors or from cirrhosis. Insulin stimulation by intravenous tolbutamide may be helpful if clearly abnormal in the patient with insulinoma.[6, 12] However, there is a significant overlap between patients with insulinomas and normal controls.

Intravenous glucagon is useful to demonstrate adequate hepatic reserves and has replaced the epinephrine test as a means of excluding liver disease.[11]

Oral or intravenous lycine administration is useful in children with hypoglycemia to determine lycine sensitivity which can be managed by a low lycine diet. Most patients with insulinomas will demonstrate lycine sensitivity but the stimulation is not so potent as with tolbutamide.[3] The test is of little practical use for the adult.

Anatomic identification of the tumor prior to operation would be highly desirable because of the difficulty of intraoperative localization. Selenomethionine scanning has generally been unsatisfactory and is limited by liver overlap. As experience with pancreatic arteriography has increased, the preoperative localization of insulinomas has become hopeful. In a recent review of 41 patients undergoing arteriography for insulinomas, there were 29 correct identifications as well as ten false negatives and two false positives.[2] Preoperative arteriography should be considered for the patient undergoing reoperation. A liver scan should be added to the preoperative evaluation for patients undergoing reoperation and for patients thought to have an islet cell carcinoma.

SURGICAL TREATMENT

For the majority of patients within insulinomas, surgical management is straightforward and consists of a thorough abdominal exploration and enucleation of the adenoma. If a major duct of the pancreas is transsected with enucleation, distal resection is preferable to attempted repair. The operative area should be drained. Intraoperative monitoring of blood glucose using either "Dextrostix"[®] or a rapid autoanalyzer technique is

useful and if marked elevation in the blood glucose occurs after the removal of the tumor, one can be confident of success. If there is not a prompt elevation, a thorough exploration should be made to avoid leaving behind a second adenoma.

If the adenoma is not readily demonstrable after thorough exploration and if the preoperative evaluation is diagnostic, one is forced to proceed with a blind resection. Pancreatic islet tissue is uniformly distributed throughout the pancreas. Since insulinomas, including those which are not palpable, are also relatively uniformly distributed,[8] it is logical to begin the blind resection with the tail and to progress proximally. If blind resection of the body and tail does not yield a gross tumor by pathologic examination at the time of operation and the blood sugars have not shown a marked increase, postoperative hypoglycemia is probable. When the preoperative diagnosis is secure, the initial approach should be aggressive and consist of progressive proximal resection of the pancreas up to 90 percent. With this approach, the majority of nonpalpable insulinomas can be recovered without subjecting the patient to the mortality and morbidity of a secondary procedure.

In half of our cases, a postoperative fistula, abscess, or fever secondary to a peripancreatic collection complicated the postoperative period. The majority of these complications respond to conservative management.

The patient with widespread functioning islet cell carcinoma presents special problems. The usual course of these patients is progressive and downhill. A few patients do surprisingly well with islet cell carcinomas which function and they may have prolonged survival. Diazoxide, which inhibits the secretion of insulin, may be valuable. Fluid retention may occur with diazoxide and require salt restriction and diuretics. A high carbohydrate diet with frequent and nocturnal feeding is helpful.

SUMMARY

A group of six patients with functioning beta islet cell tumors treated at the University of Oklahoma Medical Center over the past fiteen years has been reviewed. Difficulties in management emphasize the need for careful preoperative evaluation. A secure diagnosis allows the surgeon to be aggressive in his initial search for the nonpalpable functioning islet cell tumor. □

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Epidemiology of Clinical Infectious Hepatitis in Cleveland County, Oklahoma

From July 1, 1968 — June 30, 1969

G. REZA NAJEM, M.D., M.P.H.

R. LEROY CARPENTER, M.D.

The lack of knowledge regarding the etiology of infectious hepatitis, created major problems in prevention and control in this Cleveland County study. The chain of close personal contact transmission especially by asymptomatic cases can be broken down by good sanitary practice including more effecting hand washing.

INTRODUCTION

INFECTIOUS hepatitis has been increasing during the last several years in most areas of Oklahoma, as well as in other surrounding states.[1, 2] Cleveland County has experienced what appears to be more than average incidence during this period. In order to better define the problem, the Oklahoma State Health Department, in cooperation with the Cleveland County Health Department, conducted an extensive investigation of the clinical cases of infectious hepatitis in Cleveland County, occurring between July 1, 1968 and June 30, 1969.

From the Department of Community Health, University of Oklahoma Medical Center and Division of Epidemiology, Oklahoma State Health Department.

METHODS AND MATERIALS

The data were compiled from three sources:

1. Hospital records.
2. Private practitioners' records.
3. Oklahoma State Health Department, Communicable Disease report cards.

A questionnaire was sent to all physicians and hospitals in Cleveland County and to all those in neighboring counties, which presumably received patients from that county. In addition, personal visits were made to 16 hospitals and telephone or mail contact was made with 54 private practitioners for the purpose of obtaining records of those cases which had not been reported to the State Health Department.

Only cases of infectious hepatitis which had an onset recorded during the period July 1, 1968 through June 30, 1969, were included in this study. Records of 37 clinical cases of infectious hepatitis from Cleveland County were compiled. In some of the analyses, data from the cities of Moore, Norman and Lexington were treated separately.

Of the 37 cases studied, epidemiological information was nearly complete in 23 and adequate for certain analyses in the remaining 14.

RESULTS

Table 1 shows that 14 or 38 percent of the cases were reported, and 23 or 62 percent had not been reported to the Oklahoma State Health Department. When one considers only cases of reported infectious hepatitis, the apparent incidence in Cleveland County is 18.2 / 100,000 population; however, when one in-

Table 1.
Comparison Of Reported With Unreported Clinical Cases Of Infectious Hepatitis by Locality.
(July 1, 1968 - June 30, 1969)

CASES	Moore	Norman	Lex-ington	TOTAL No.	TOTAL Incidence*
Reported	5	7	2	14	18.2
Unreported	14	8	1	23	29.9
No.	19	15	3	37	48.1
TOTAL Incidence*	117.5	25.3	**		

*Incidence per 100,000 population
**Insufficient data for calculation

cludes the unreported cases the actual incidence of clinical infectious hepatitis is found to be 48.1/100,000 population. The number of unreported cases exceeded the number of reported cases by nearly 2:1.

The small number of cases in Lexington makes it impossible to compare incident data with the other two localities. However, Table 1 shows the incidence of clinical infectious hepatitis in Moore to be 117.5/ per 100,000 population compared to 25.3 in Norman and 48.1 for the entire Cleveland County.

Two patients died as a result of hepatitis. Both were Caucasian males, one, aged 82 years from Lexington, and the other, aged 84 years from Moore. Therefore, the case fatality in this study is 5.4 percent. One 80-year-old white female from Moore was re-admitted to the hospital due to recurrence of signs and symptoms of the disease after 36 days. Thus, the relapse rate is 2.7 percent.

Table 2 shows that there were 22 or 59 percent female cases and 15 or 41 percent males. The sex difference is much greater for females in Lexington and Moore but only slightly in Norman.

All cases were Caucasian except one 24-year-old Negro male law student from Norman.

Table 2.

Sex Distribution of Clinical Infectious Hepatitis by Locality
(July 1, 1968 - June 30, 1969)

SEX	Moore		Norman		Lexington		Total	
	No.	%	No.	%	No.	%	No.	%
Male	7	37	7	47	1	33	15	41
Female	12	63	8	53	2	67	22	59
TOTAL	19	100	15	100	3	100	37	100

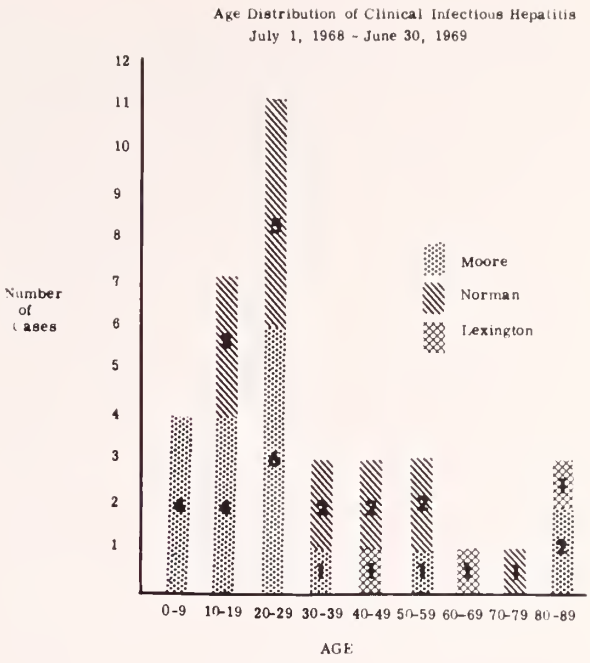


Figure 1

The ages of the patients ranged from three to 84 years and the age of one patient from Moore was not stated. Figure 1 shows that the number of cases increased sharply from the age group under ten years to its peak in the age group 20 to 29 years. All the patients under age ten were from Moore. It is interesting to note that there were more younger patients in Moore than in Norman and Lexington. The median age for hepatitis cases in Moore is 21 years, 29 years in Norman, and 62 years in Lexington. The overall median age for total cases of the three localities is 24 years.

Figure 2 shows that there were two temporal peaks. The small peak which consists of six cases was in January and the larger one with ten cases in June. Twenty or 54 percent of the cases occurred during the months of April, May and June. There were no cases during February and July.

Table 3 shows a progressive increase in reported cases of infectious hepatitis both in Cleveland County and in the State of Oklahoma from 1965 through 1968. However, the rate of the disease in the State of Oklahoma decreased from 19 cases per 100,000 population in 1968 to 15 cases per 100,000 population in 1969, while the rate of infectious hepatitis in Cleveland County continued to increase from 18 cases per 100,000 in 1968

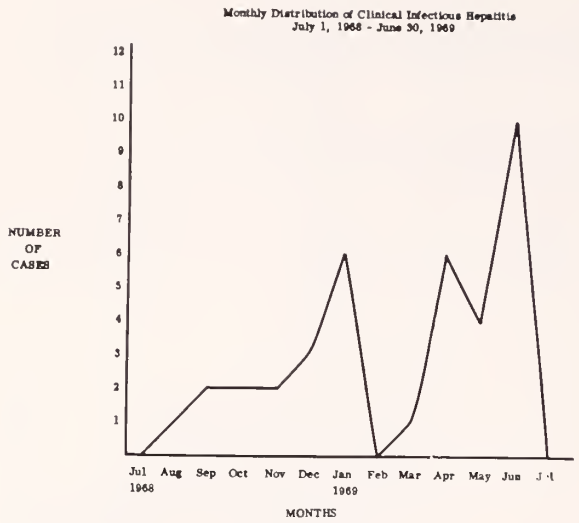


Figure 2

to 27 cases per 100,000 population in 1969.

Among the 17 persons whose occupations were recorded, the largest number was five housewives. Other occupations included, according to their frequency, were: Students, grocery store manager, employee of U.S. Department of Agriculture, and a Tinker Air Force Base employee.

Table 3.
Infectious Hepatitis*

Year	Number of Cases		Rate per 100,000 pop.	
	Cleveland Co.,	State of Okla.	Cleveland Co.,	State of Okla.
1969	21	373	26.6	14.7
1968	14	482	18.4	19.1
1967	8	345	10.9	13.7
1966	3	117	4.2	4.7
1965	3	62	4.4	3.5

*Reported to the Division of Epidemiology (Oklahoma State Health Department)

Contact with other known cases prior to the onset of their illness was stated by 24 percent of the cases. Among these, 11 percent had household contact, 13 percent had outside contact, and 41 percent had no known contact with other hepatitis cases. The contact history of 35 percent of the cases was not stated.

Forty-three percent of the cases in this series were hospitalized and 57 percent were not. It is of importance to note that 58 percent of non-hospitalized cases were from Norman.

Of the total cases where icterus information was obtained 83 percent were jaundiced and 17 percent were not. The ratio is approximately 5:1.

Transaminase tests were performed in 27 or 73 percent of the cases and were not done or not stated in the remaining 10. The lowest level was 18 units and the highest level was 2680 units. The mean level of the transaminase values was 574 units with a standard deviation of ±559.

Serum bilirubin tests of 17 or 46 percent of the cases have been examined, and not stated in the remaining 20. The lowest level of serum bilirubin was 0.1 mg/100 ml., and the highest level was 18.5 mg/100 ml. The mean level of serum bilirubin was 8.5 mg/100 ml., with a standard deviation of ±5.5.

DISCUSSION

The ratio of unreported cases to reported cases of clinical infectious hepatitis was nearly 2:1 for Cleveland County and almost 3:1 for the City of Moore, Oklahoma.

Since this study was designed to investigate clinical cases of infectious hepatitis, the ratio of the icteric to anicteric cases is nearly 5:1. However, in any community, especially in developing areas, there are many more anicteric cases than icteric.[3] The exact ratio in any given community is not entirely consistent or clear. Some authors have found that the ratio approached unity.[4] A study of viral hepatitis in Taiwan showed a ratio of anicteric to icteric forms in the confined military district to be 34:1.[5]

There were more clinical cases of infectious hepatitis in Moore than in other localities of Cleveland County. The mobile younger population of Moore, with young children, attending relatively large schools and living in relatively large tracts of suburban homes, may account for an increased exposure to a larger number of infected persons.

Though this may be the main avenue of exposure, there is a possibility that the working group of Moore who have jobs outside of the Moore area, may also contact a larger number of people adding to their risk of exposure to the infectious hepatitis virus.

From the temporal and geographic pattern of the disease distribution in this study,

one must conclude that person-to-person spread of the disease was the method of transmission rather than a common vehicle such as food or water.

The incidence of clinical infectious hepatitis in this study was 48.1 cases per 100,000 population, which is more than twice the rate of reported cases for the entire State of Oklahoma in 1968. However, when one compares only the cases officially reported to the Division of Epidemiology of the State Health Department there is no difference in the incidence of infectious hepatitis in Cleveland County and the State of Oklahoma during 1968. The relapse rate was 2.7 percent which was expected.[6, 7] The case fatality was 5.4 percent which is higher than the national figure of one percent case fatality.[8]

There were more female cases than male cases. This may be partially due to the fact that more females visit physicians than do males; and also, more females care for infected anicteric or icteric children than males.

The peak age distribution was 20 to 29 years. The overall age distribution indicated a significant increase in the ratio of adults to children which may suggest that a new epidemiological factor occurred. This type of shift in age distribution has also been reported recently in many areas of Europe and North America. The reason for this change is not entirely clear, but a study of the relationship between age pattern and population density may provide partial explanation.[9] By and large, the fact that infectious hepatitis is more severe in adults and also that adults may visit physicians more than children, may provide additional explanation to the age shift of the disease in this study.[10] The younger age distribution of patients in Moore compared to Norman and Lexington reflects the fact that Moore has a younger population.

The higher peak of clinical infectious hepatitis was in the month of June which is later than the usual peak of the disease in the nation (usually in January through March). This peak represents a clustering of ten cases from all three locations of the County during the month of June. The second peak in this study which was in January coincides with the usual peak of the disease in the nation.[3]

The increase of reported infectious hepatitis from 1966 through 1969 may reflect the six-to-seven-year interval epidemic pattern of infectious hepatitis in the nation.[2] Also, one or all of the following factors may contribute partially to this increase: the improvement of reporting systems, better diagnosis of the disease; and the increasing mobile population of Moore.

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SUMMARY

An extensive questionnaire survey was utilized to reveal 37 cases of clinical infectious hepatitis in Cleveland County, Oklahoma, between July 1, 1968 and June 30, 1969. The estimated incidence of typical infectious hepatitis in Cleveland County was 48.1 per 100,000 population with a relapse rate of 2.7 percent and case fatality of 5.4 percent during the period of this study. The ratio of unreported to reported cases was almost 2:1 for the entire county. Out of these numbers 43 percent of the cases were hospitalized. The mean level of transaminase values was 574 units. The mean level of serum bilirubin values was 8.5 mg/100 ml. The incidence of clinical infectious hepatitis was more in females than in males in this study. There was a remarkable increase in the ratio of adult to child cases. The highest peak of age distribution in this study was in the age group 20 to 29 years. The sea-

sonal distribution study showed two peaks; the first peak of 10 or 27 percent was in June and the second peak of 6 or 16 percent was in January. The incidence of reported cases of infectious hepatitis in Cleveland County has increased markedly from 1966 through 1969.

Moore had the largest rate of 117.5 cases of infectious hepatitis per 100,000 population, 78 percent of which were below 30 years of age. The increasing number of cases of infectious hepatitis in Cleveland County in this study is attributed most to the relatively higher person-to-person contact of the younger mobile population of Moore.

ACKNOWLEDGEMENT

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An increased risk of thromboembolic disease associated with the use of hormonal contraceptives has now been shown in studies conducted in both Great Britain and the United States. Other risks, such as those of elevated blood pressure, liver disease and reduced tolerance to carbohydrates, have not been quantitated with precision. Long-term administration of both natural and synthetic estrogens in subprimate animal species in multiples of the human dose increases the frequency of some animal carcinomas. These data cannot be transposed directly to man. The possible carcinogenicity due to the estrogens can be neither affirmed nor refuted at this time. Close clinical surveillance of all women taking oral contraceptives must be continued.



Indication—Demulen is indicated for oral contraception.

Contraindications—Patients with thrombophlebitis, thromboembolic disorders, cerebral apoplexy or a past history of these conditions, markedly impaired liver function, known or suspected carcinoma of the breast, known or suspected estrogen-dependent neoplasia and undiagnosed abnormal genital bleeding.

Warnings—The physician should be alert to the earliest manifestations of thrombotic disorders (thrombophlebitis, cerebrovascular disorders, pulmonary embolism and retinal thrombosis). Should any of these occur or be suspected the drug should be discontinued immediately.

Retrospective studies of morbidity and mortality in Great Britain and studies of morbidity in the United States have shown a statistically significant association between thrombophlebitis, pulmonary embolism, and cerebral thrombosis and embolism and the use of oral contraceptives. There have been three principal studies in Britain[1-3] leading to this conclusion, and one[4] in this country. The estimate of the relative risk of thromboembolism in the study by Vessey and Doll[3] was about sevenfold, while Sartwell and associates[4] in the United States found a relative risk of 4.4, meaning that the users are several times as likely to undergo thromboembolic disease without evident cause as nonusers. The American study also indicated that the risk did not persist after discontinuation of administration, and that it was not enhanced by long-continued administration. The American study was not designed to evaluate a difference between products. However, the study suggested that there might be an increased risk of thromboembolic disease in users of sequential products. This risk cannot be quantitated, and further studies to confirm this finding are desirable.

Discontinue medication pending examination if there is sudden partial or complete loss of vision, or if there is a sudden onset of proptosis, diplopia or migraine. If examination reveals papilledema or retinal vascular lesions medication should be withdrawn.

Since the safety of Demulen in pregnancy has not been demonstrated, it is recommended that for any patient who has missed two consecutive periods pregnancy should be ruled out before continuing the contraceptive regimen. If the patient has not adhered to the prescribed schedule the possibility of pregnancy should be considered at the time of the first missed period.

A small fraction of the hormonal agents in oral contraceptives has been identified in the milk of mothers receiving these drugs. The long-range effect to the nursing infant cannot be determined at this time.

Precautions—The pretreatment and periodic physical examinations should include special reference to the breasts and pelvic organs, including a Papanicolaou smear, since estrogens have been known to produce tumors, some of them malignant, in five species of subprimate animals. Endocrine and possibly liver function tests may be affected by treatment with Demulen. Therefore, if such tests are abnormal in a patient taking Demulen, it is recommended that they be repeated after the drug has been withdrawn for two months. Under the influence of progestogen-estrogen preparations preexisting uterine fibromyomas may increase in size. Because these agents may cause some degree of fluid retention, conditions which might be influenced by this factor, such as epilepsy, migraine, asthma, cardiac or renal dysfunction, require careful observation. In breakthrough bleeding, and in all cases of irregular bleeding per vaginam, nonfunctional causes should be borne in mind. In undiagnosed bleeding per vaginam adequate diagnostic measures are indicated. Patients with a history of psychic depression should be carefully observed and the drug discontinued if the depression recurs to a serious degree. Any possible influence of prolonged Demulen therapy on pituitary, ovarian, adrenal, hepatic or uterine function awaits further study. A decrease in glucose tolerance has been observed in a significant percentage of patients on oral contraceptives. The mechanism of this decrease is obscure. For this reason, diabetic patients should be carefully observed while receiving Demulen therapy. The age of the patient constitutes no absolute limiting factor, although treatment with Demulen may mask the onset of the climacteric. The pathologist should be advised of Demulen therapy when relevant specimens are submitted. Susceptible women may experience an increase in blood pressure following administration of contraceptive steroids.

Adverse reactions observed in patients receiving oral contraceptives—A statistically significant association has been demonstrated between use of oral contraceptives and the following serious adverse reactions: thrombophlebitis, pulmonary embolism and cerebral thrombosis.

Although available evidence is suggestive of an association, such a relationship has been neither confirmed nor refuted for the following serious adverse reactions; neuro-ocular lesions, e.g., retinal thrombosis and optic neuritis.

The following adverse reactions are known to occur in patients receiving oral contraceptives: nausea, vomiting, gastrointestinal symptoms (such as abdominal cramps and bloating), breakthrough bleeding, spotting, change in menstrual flow, amenorrhea during and after treatment, edema, chloasma or melasma, breast changes (tenderness, enlargement and secretion), change in weight (increase or decrease), changes in cervical erosion and cervical secretions, suppression of lactation when given immediately post partum, cholestatic jaundice, migraine, rash (allergic), rise in blood pressure in susceptible individuals and mental depression.

Although the following adverse reactions have been reported in users of oral contraceptives, an association has been neither confirmed nor refuted: anovulation post treatment, premenstrual-like syndrome, changes in libido, changes in appetite, cystitis-like syndrome, headache, nervousness, dizziness, fatigue, backache, hirsutism, loss of scalp hair, erythema multiforme, erythema nodosum, hemorrhagic eruption and itching.

The following laboratory results may be altered by the use of oral contraceptives: hepatic function: increased sulfobromophthalein retention and other tests; coagulation tests: increase in prothrombin, Factors VII, VIII, IX and X; thyroid function: increase in PBI and butanol extractable protein bound iodine, and decrease in T^3 uptake values; metyrapone test and pregnanediol determination.

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Chronic Cholestatic Jaundice in Infancy

J. R. POLEY, M.D.

A review is presented on the problems of diagnosis, differential diagnosis and treatment of chronic cholestatic jaundice in infancy.

PERSISTENT cholestatic jaundice in infants poses a difficult problem regarding differential diagnosis and management. So-called neonatal hepatitis (NH) and extrahepatic biliary atresia (EHBA) account for about 90 percent of cases of infants with jaundice persisting after the fourth week of life.[1] Since NH and EHBA are the two conditions most frequently responsible for chronic infantile cholestatic jaundice, the discussion is limited to these entities, in particular to their differential diagnosis and management.

Other conditions leading to prolonged infantile jaundice (i.e. septicemia, galactosemia, syphilis, toxoplasmosis, and rarely, hypothyroidism) can ordinarily be ruled out earlier by appropriate tests. A helpful feature is that the above conditions are characterized by predominance of unconjugated bilirubin in the serum. However, in the post-hemolytic phase of AB-O or Rh-incompatibility, a period of hyperbilirubinemia with a predominance of conjugated pigment may persist for two or three weeks.

INCIDENCE

Little is known about the overall incidence of NH and EHBA since it appears to vary geographically. EHBA has been estimated to account for 50 percent[2] to 75 percent[3] of all cases of prolonged infantile cholestatic jaundice. Observations from several European countries give an average incidence of EHBA of .6/10,000 births.[4, 5] Since EHBA accounts for about half to two-thirds of all cases of prolonged infantile jaundice, the combined incidence of NH and EHBA probably is about one in 10,000 live births. At Children's Memorial Hospital of the University of Oklahoma Medical Center, three to five infants with chronic cholestatic jaundice due to NH and EHBA are admitted yearly.

Occasional reports[5, 6] from other centers have described an increased incidence of NH in siblings and both disorders have been observed in siblings of a single family.[7] The sex ratio in NH and EHBA shows a slight preponderance of males.[4, 5] In contrast to NH, familial involvement in EHBA is unusual[5] and only rare occurrences in siblings are known.[4]

ETIOLOGY

The precise etiology leading to either NH or EHBA is unknown. Both conditions have their onset during intrauterine life and it is possible that EHBA or forms thereof (bile duct hypoplasia) may be a late sequel to early intrauterine NH, since in many cases

of "atresia" a rudimentary biliary tract seems to exist.[8]

NH is not a distinct entity because a number of causative agents have been implicated: the hepatitis agent,[6] the cytomegalovirus, the rubella virus, the mononucleosis virus, the herpes simplex virus, coxsackie group B viruses, and others.[3, 9] However, convincing evidence is lacking that viruses are responsible for all cases of "neonatal hepatitis."

The etiology of EHBA is equally obscure. Some cases of extreme extrahepatic biliary hyploplasia may be the sequel of "disuse atrophy" following intrauterine liver disease. EHBA as an embryonic malformation of early or late gestation has been considered.[3]

Observations of concordance[10] and discordance[11] for NH in monozygotic twins have been too few to be meaningful and are inconsistent with either an infectious or a simple genetic etiology. The association of trisomy 17-18 in a significant number of patients with NH and EHBA[4, 12] and patent ductus arteriosus in NH[4, 7] points towards a common etiologic agent such as a virus. The association of NH with infantile cortical hyperostosis[13] is likewise compatible with either a genetic or a viral etiology. A mutant autosomal gene in the homozygous form as the cause of either disease has been proposed[5] but proof is lacking. On balance, it is conceivable that NH and EHBA represent different phases of the same fundamental disease process[14] and that the clinical "end-stage" of these disorders is the result of a common reaction of liver and bile duct tissues to a host of injurious factors.

CLINICAL FINDINGS

Jaundice and hepatomegaly are most common. Jaundice usually has been present since birth or shortly thereafter. Splenomegaly is present in the majority of infants and seemingly commoner in patients with NH.[2] Hemorrhagic phenomena occur in both conditions but are said to occur more often in children with EHBA.[2] Failure to thrive secondary to maldigestion (bile salt deficiency) and malabsorption of lipids and lipid soluble vitamins is frequent.[15] Most patients have steatorrhea. Deficient absorption of calcium and vitamin D leads to demineralization of bone (craniotabes) and even to frank rickets. Malabsorption of vitamin K is followed by a deficient prothrombin synthesis leading to hemorrhagic phenomena. Acholic stools occur with EHBA as well as with NH.[2] Of interest is the low birth weight in infants with NH[5] which seems to be reasonable evidence for intrauterine disease. Massive nonchylous ascites may be present in the newborn period and is regarded as a sign of congenital liver disease.[16]

DIFFERENTIAL DIAGNOSIS

There are few conditions that are as frustrating to the clinician as is the differentiation of NH and EHBA. Very frequently, the answer has to be provided by the surgeon. However, there are some facts worth emphasizing. To establish an exact diagnosis is singularly important. One would not want to operate (exploration and operative cholangiogram) on an infant with NH because of the high (greater than 60 percent) postoperative risks of morbidity or mortality following extensive procedures.[1] Infants with NH who are operated upon develop chronic active liver disease at three times the rate of infants not undergoing surgery.[1] On the other hand, one would like to offer all possible help to a patient with EHBA. Although the incidence of surgically correctable lesions seems to lie between 12 percent[17] and 23 percent,[18] the reported incidence of successful surgical interventions with reestablishment of bile flow is considerably lower, probably at the three to five percent level.[1, 8] What means are currently at our disposal to help in the differential diagnosis between NH and EHBA?

1. *Standard Laboratory Tests*

The usual blood tests reflecting liver function e.g., alkaline phosphatase, SGO, and SGP transaminases (including their ratios), cholinesterase, bilirubin and prothrombin time, are nearly always abnormal in both NH and EHBA and are therefore of little or no help in distinguishing between NH and EHBA at any single point in time. Further, levels may fluctuate from day to day.[7] A level of conjugated bilirubin greater than

five mg.% has been found to be more frequently associated with EHBA but it has also been observed in 40 percent of patients with NH.[2] However, sequential examination of serum bilirubin, SGO transaminase, alkaline phosphatase may show trends, which are helpful in assessing further developments, particularly progression of NH into chronic liver disease after the fourth month of life.[1] Thymol turbidity and flocculation tests have a very poor discriminating value and are useless in this situation.

The test using bromosulfaphthalein (BSP) is not interpretable in the presence of significant jaundice and hence is not useful. The determination of fecal urobilinogen is also considered of little value.[3] Serological tests for syphilis are not always reliable in the newborn period and tests for cold agglutinins and heterophile agglutination are without value in the conditions under discussion. To rule out toxoplasmosis, examination of the spinal fluid should be performed.[3]

2. *Percutaneous Liver Biopsy*

Percutaneous needle biopsy of the liver as an aid in the diagnosis or differential diagnosis of chronic infantile obstructive jaundice is considered of great value.[3, 19, 20] Further, serial biopsies are eminently helpful in the determination of the course of the disease, particularly if tests relating to liver function are not grossly abnormal. This procedure is considered safe in the hands of an experienced operator, provided that blood clotting mechanisms are well within normal limits. Major complications, such as significant post-biopsy hemorrhage, are extremely infrequent.[19]

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The range of error in the interpretation of pathological findings reported by various groups ranges from 24 percent[14] to less than ten percent.[17, 20] It should be mentioned that the finding of giant-cell transformation is a non-specific phenomenon. It occurs in NH, in EHBA, and in chronic active liver disease of older children.[7] Most often, moderate to marked fibrosis (periportal and interlobular) with bile duct proliferation but without conspicuous inflammatory cell migration is suggestive of EHBA. Further, the presence of many bile-filled and dilated bile ducts (bile lakes) are an additional criterium for EHBA.[17]

3. *Special Tests*

a. *^{131}I Rose Bengal Excretion Test*

The ^{131}I-labelled Rose Bengal excretion test is probably the best discriminating test available; however, its reliability is not 100 percent. Rose Bengal is given intravenously and the percentage of the radioactive label excreted in the stool during a period of 96 hours following injection is determined. Levels below five percent are considered diagnostic of EHBA.[21] There are some disadvantages, however: Stool has to be collected over a period of four days and the greatest care has to be exercised that the stool is not contaminated by urine since most of the radioactivity is excreted in the urine. It is particularly difficult to avoid such contamination when testing female infants. Further, about 20 percent of patients with NH show only an excretion between six to ten percent[1] owing to significant intrahepatic cholestatis. For these and other reasons, this test is not employed at many centers. However, in our experience at the University of Oklahoma Medical Center, we have found this test useful, particularly in conjunction with the following test.

b. *Test for Abnormal Low-Density Lipoprotein (LP-X) in the Serum*

The recent detection and characterization of an abnormal low-density lipoprotein[22] in the serum of adults with extrahepatic biliary obstruction seemed of considerable promise in that sera of infants with chronic obstructive jaundice could also be tested for the presence or the absence of this lipoprotein. LP-X is conveniently detected by immunoelectrophoresis and requires only one drop

of the patient's serum. This test has been employed over the past year in a cooperative effort between the Children's Memorial Hospital and the Oklahoma Medical Research Foundation.[23, 24] The results obtained thus far are very encouraging. Sera of 12 infants aged one to five months with chronic obstructive jaundice have been tested. Of these, five had EHBA and seven NH. In the former group, LP-X has been uniformly present. In the group with NH, however, LP-X was not detectable. LP-X is also absent in normal children and in children with hemolytic or nonhemolytic unconjugated hyperbilirubinemia.[24] However, in order to establish and confirm the anticipated value of this test, more infants have to be examined.

It is best to rely on a combination of tests such as the Rose-Bengal Excretion Test, the test for LP-X and the percutaneous liver biopsy. If the results of all three tests are unequivocally indicative of EHBA, exploratory surgery with attempt at correction should be undertaken. If test results are equivocal, it is best to wait about three weeks and repeat the tests with the exception of the liver biopsy. It is believed that one can safely wait with surgery until the infant is three to four months of age. True cirrhosis is generally a late sequel; however, significant fibrosis may be present by the age of two months but is seems to progress slowly.[1]

MANAGEMENT

Prime attention is directed toward the long-term treatment of infants with a correctable as well as a non-correctable EHBA and of patients who develop chronic active liver disease, e.g. infants with NH whose liver involvement progresses to a chronic stage. Factors contributing toward perpetuation of liver disease are largely unknown. However, there is preliminary evidence[7] that an increased intrahepatic concentration of bile acids may be responsible for continued liver cell damage and/or fibrous tissue formation. Consequently, the administration of cholestyramine ("Questran,"® Mead-Johnson) should be helpful to minimize the injurious effects of bile acids on liver and bile duct epithelium by increasing fecal excretion of bile acids. Bile acid-induced pruritus is significantly alleviated by cholestyramine in patients with chronic active liver disease secondary to NH or EHBA. One must remember that cholestyramine also binds to long-chain dietary fatty acids and its administration would increase malabsorption of lipid and lipid-soluble vitamins. Therefore, patients receiving cholestyramine should beceive a diet in which about 80 percent of the usual (animal and vegetable) long-chain fat is replaced by medium-chain triglyceride fat ("MCT-Oil,"® Mead-Johnson). This fat is effectively absorbed, since it does not require bile salts for intraluminal dispersion and since it binds poorly to Cholestyramine. Trials employing cholestyramine and "MCT-Oil"® in infants with chronic active liver disease at the Children's Memorial Hospital have recently begun and preliminary results are encouraging: Improved appetite, weight gain, growth acceleration, an increase of activity with improved exercise tolerance, significant lessening or alleviation of pruritus and a decrease in jaundice have been among the more notable changes.[7]

Glucocorticoids have been disappointing in the management of chronic infantile obstructive jaundice. Liver histology remains unchanged.[7]

PROGNOSIS

With regard to NH, no data are available that show the percentage of infants recovering completely. Complete recovery is more frequent in infants not operated upon.[1] At least 50 percent of infants followed by one study[1] continued to have functional hepatic abnormalities for at least one year. Hence, all patients who clinically recovered from NH should be followed carefully and closely for two to three years. Infants developing chronic active liver disease have a more guarded prognosis since they may develop cirrhosis and die from its complications or, prior to that, from hepatic failure. The average life-span of patients with EHBA is about 18 months; 75 percent die within the first two years and 90 percent did not survive beyond the fourth year of life.[25] Hepatic decompensation with ascites and hemorrhage

develops late, usually preceding death by less than four months.[25] In addition to liver failure, one of the prime causes of death is intercurrent infection, hence control of such infections with antibiotics is probably the most important single factor in increasing the life span of these unfortunate children.

Finally, a word should be said about the feasibility of human liver transplants for patients with advanced chronic liver disease, due either to NH or EHBA. Orthotopic homotransplantations have been carried out successfully[26] but few recipients were kept alive for several months. Formidable problems still remain such as proper donor selection, organ preservation, control of early complications (maintenance of liver function, infection, hypercoagulability) as well as transplant rejection. □

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Highlights of Cardiac Auscultation

JOSEPH K. PERLOFF, M.D.

There are few areas of cardiology that auscultation does not animate. Knowledge of this discipline remains a hallmark of the good clinician.

Introduction by
Thomas A. Bruce, M.D.

There is a needed renaissance among physicians today on bedside evaluation of the cardiovascular patient. There is a tendency among us all to de-emphasize this important art and to lean more heavily on the highly specialized skills of cardiac catheterization, selective cineangiography, intracardiac phonocardiography, etc. for diagnosis and for information about therapeutic success.

A great deal of feedback has, in fact, been derived from such sophisticated physiologic studies about the meaningfulness of simple heart sounds and common murmurs. It is likely that 90 percent of all cardiac problems can now be diagnosed accurately without cardiac catheterization, including even the complex congenital defects. Of even more help to the general doctor is the appearance of abnormal heart sounds during early congestive heart failure or paradoxical splitting of the second heart sound during myocardial damage or infarction (sometimes when even the ECG is not diagnostic). Doctor Perloff reviews the basic features of importance in this succinct review article.

THE PRACTICAL USE of cardiac auscultation requires an understanding of certain elementary principles. First, auscultatory events must be *heard* before they can be interpreted; accordingly, the technicalities and techniques of auscultation are paramount. Second, recognition of the various heart sounds, especially the first and second sounds, defines systole and diastole and establishes the timing of the different phases of the cardiac cycle. Third, the timing of murmurs can readily be accomplished once the phases of the cardiac cycle are defined. The following remarks will touch on each of these three principles.

TECHNICALITIES AND TECHNIQUES

The chain of success in this area consists of a number of links. The *instrument* of auscultation is the stethoscope that was introduced by Laennec in 1819. The ideal stethoscope is yet to be devised but good instruments are available and certain guidelines are useful in their selection. Both a bell and a diaphragm are necessary, the former for the low frequency ranges and the latter for the high. Connecting tubing should be relatively firm and single; double tubes are acoustically less efficient and cause extraneous noise when they touch or rub together. The overall length of the entire stethoscope should be about 22 inches. The binaural ear pieces should be relatively large so that they occlude the external auditory canals and do not uncomfortably enter them. Finally, all connections must be airtight in order to avoid loss of sound by leakage.

The next link in the chain is the sensing device, i.e. the human ear which can be trained to sense the broad range of frequencies emanating from the heart and blood vessels. It is encouraging to know that the ear is more efficient than the phonocardiogram in recognizing high frequencies such as the soft murmur of aortic incompetence. The ears are all important since even the best stethoscopes do *not* amplify sound but merely transmit it to the ears with relatively little loss. Perhaps the most important link in the chain is the interval between the stethoscopic ear pieces, namely, the human brain. The brain interprets what is heard, and in order to do so effectively it must be programmed by years of experience. Once these technical links—the instrument, the sensing device, the interpreter and the programming—are forged, we can turn attention to the auscultatory technique itself.

Auscultation should be conducted in a quiet examining room that is free of ambient noise and that has a temperature so regulated as to avoid shivering. The patient must be relaxed and comfortable and the examiner unhurried. Various postures should be employed such as supine, prone, left lateral decubitus, sitting, leaning forward, standing, or squatting. Respiratory patterns should also be appropriately selected including quiet or arrested breathing for routine auscultation, full held exhalation for the soft murmur of aortic incompetence, or normal or exaggerated respiratory excursions for the behaviour of the second heart sound or for certain right-sided events. Physical and pharmacologic interventions are useful and include coughing, effort, squatting, isometric tension (squeezing the clinched fists), and certain vasoactive drugs especially amyl nitrite and pressor agents. When the bell of the stethoscope is applied with varying degrees of pressure, a relatively broad range of frequencies can be elicited. When the bell is touched lightly to the skin, low frequencies are heard (soft third heart sound); when high frequencies are paramount, firm pressure with the diaphragm is required. Palpation should precede auscultation so that the stethoscope can be placed precisely at the most appropriate precordial sites. Finally, auscultation should not be confined to the precordium but should include the right chest, axillae, back, neck, flanks, abdomen, groins, and at times the eyeballs and skull.

THE HEART SOUNDS

The normal heart sounds define the phases of the cardiac cycle and serve as standards by which abnormal heart sounds can be judged. The first heart sound is best assessed at the apex or lower left sternal edge and is either single or closely split. Splitting is usually confined to the lower left sternal edge and is normally not heard at the base. Although analysis of the first heart sound provides helpful information, analysis of the *second* heart sound is far more useful and has been called the key to auscultation of the heart. Proper interpretation of the second sound assumes an awareness of its location, splitting, and intensity. In the second left intercostal space there are two components, aortic and pulmonic, which are synchronous (or nearly so) during exhalation and which are clearly split during inhalation. A judgment regarding the intensity of pulmonary valve closure requires comparison with aortic closure when *both* sounds are heard simultaneously during inhalation. The comparative softness of the pulmonary closure sound is held responsible for its localization in the vicinity of the second left intercostal space, and the relative loudness of aortic closure accounts for its audibility at all areas. It should be emphasized that A_2 refers to *aortic* valve closure and P_2 to *pulmonary* valve closure. A_2 and P_2 do *not* refer to the second

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heart sound in the "aortic" vs. the "pulmonary" area; such use implies a complete misunderstanding of the origin of the two components of the second sound. Similarly, P_2 by definition is a single sound caused by pulmonary valve closure, so the expression "*split* P_2" is a misnomer that should be abandoned.

The third and fourth heart sounds are best understood in relation to the two diastolic phases of ventricular filling. These sounds originate *within* the recipient ventricle, the third sound during the mid diastolic rapid filling phase immediately after opening of the mitral and tricuspid valves and the fourth sound duing the late diastolic filling phase associated with atrial contraction. Accordingly, a fourth heart sound implies sinus rhythm. Both sounds are low frequency events that are most readily heard with light touch of the stethoscopic bell.

The foregoing heart sounds—first, second, third, and fourth—can either be normal or abnormal. The *following* sounds are, for all practical purposes, abnormal events.

Opening snaps characteristically originate in the mitral valve usually because of stenosis. The snap is relatively high frequency, is heard not only at the apex but also at the sternal edge and base, and is best elicited with the stethoscopic diaphragm or firm pressure with the bell. Since the mitral valve must open before the ventricle can fill, the timing of the opening snap necessarily precedes the timing of the third heart sound.

Ejection sounds are high pitched, clicking early systolic events that originate in either the left heart (aortic valve or dilated ascending aorta) or right heart (pulmonic valve or dilated pulmonary trunk). These sounds tend to be heard at the *base* of the heart and should not be mistaken for split first heart sounds. The aortic ejection sound is well-heard at both the base and apex and with rare exception does not vary with respiration; the pulmonic ejection sound is well-heard in the second left intercostal space and often varies characteristically with respiration, getting selectively softer with inhalation and louder with exhalation.

Systolic clicks must be distinguished from ejection sounds. The clicks are similar to ejection sounds in frequency but not in timing or chest wall location. Clicks generally originate in redundant mitral chordae tendineae; they are single or multiple, maximal at the apex, and begin in mid to late systole.

CARDIAC MURMURS

A cardiovascular murmur is a relatively prolonged series of auditory vibrations characterized according to intensity (loudness), frequency (pitch), configuration (shape), quality, duration, direction of radiation and timing in the cardiac cycle. The timing of murmurs is particularly important since it serves as a basis for classification. Systolic murmurs are classified according to their time of onset and termination as midsystolic, holosystolic, early systolic, or late systolic. A midsystolic murmur begins after the first heart sound and ends before the second sound (aortic stenosis). A holosystolic murmur begins with the first heart sound, occupies all of systole, and ends with the second heart sound (classic mitral incompetence). Early systolic murmurs begin with the first heart sound, diminish in a decrescendo fashion, and end at or before midsystole (very small ventricular septal defect with early systolic shunt). Late systolic murmurs begin in mid to late systole and end with the second heart sound (mitral incompetence with late systolic regurgitation). Finally, *extracardiac systolic arterial murmurs* originate in either systemic or pulmonary arteries. The existence of such murmurs emphasizes the importance of careful auscultation at nonprecordial sites.

Diastolic murmurs are classified according to their time of *onset* as early diastolic, middiastolic, or late diastolic (presystolic). An early diastolic murmur begins with the second heart sound (aortic incompetence). A middiastolic murmur begins at a clear interval after the second heart sound (mitral stenosis with atrial fibrillation). A late diastolic murmur or presystolic murmur begins in the period immediately before the first heart sound (mitral stenosis with sinus rhythm).

The term "continuous" is best applied to

murmurs that begin in systole and continue without interruption through the time of the second heart sound into all or part of diastole. Persistence of murmurs throughout the cardiac cycle is therefore not a requirement. Accordingly, a murmur that proceeds into diastole without stopping at the second heart sound is considered continuous whether or not it finishes before the next first heart sound. Continuous murmurs can be due to aortopulmonary communications (patent ductus), arteriovenous connections (systemic arteriovenous fistulas), or can be purely arterial (arterial constriction), or purely venous (venous hum).

SUMMARY

There are few areas of clinical cardiology that auscultation does not illuminate. This paper has reviewed three areas relevant to this topic: 1) the technicalities and techniques of auscultation, 2) the heart sounds, and 3) cardiovascular murmurs. Skill in auscultation remains a hallmark of the good clinician and it is understandable why this is so. □

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Tumor Clinic Proceedings

Edited by
RICHARD H. BOTTOMLEY, M.D.

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Case No. 31: Possible Adenocarcinoma of the Colon in a Patient with Acute Monomyeloblastic Leukemia

PRESENTATION: The patient is a 43-year-old Mexican-American who was seen at the OMRF in January, 1970. At that time he complained of a four to five month history of weakness and a 20 pound weight loss. Because of these symptoms he had consulted his local physician, who found him to be anemic and performed a barium enema and proctoscopy at which time multiple polyps were seen in the colon. One was biopsied and sent to a pathologist who reported it to be an adenocarcinoma of the colon. He was then referred to another hospital for colectomy, but he was found to have a white count of 15,000/mm^3 with 80 percent monocytes and a hematocrit of 23 percent. A bone marrow study carried out at that time was compatible with the diagnosis of monocytic leukemia. He was then referred here. His past history reveals only that he had bloody diarrhea as a child; the rest is non-contributory. The review of systems reveal that he had some gingival hyperplasia and also that he had some decrease in his appetite without vomiting, diarrhea or pain. He has had bloody stools on several occasions. The patient has no information about his parents or possible siblings, and therefore we do not know whether there was a familial history of polyps of the colon or any malignant disease. Physical findings were within normal limits except that polyps were felt on rectal examination.

A bone marrow aspiration was performed and showed 70 percent blasts. A chem 16 with a liver profile done at that time was within normal limits except for a moderately elevated LDH. In an attempt to induce a remission he was given prednisone, vincristine ("Oncovin," Lilly), and cytosine arabinoside ("Cytosar," Upjohn). The first course was given January 20, 1970, and was repeated on February 10, 1970. The patient developed leukopenia, had a febrile course

The University of Oklahoma Medical Center Tumor Clinic meets weekly in Goddard Auditorium of the Oklahoma Medical Research Foundation, and is made up of members of the Departments of Dermatology, Medicine, Oral Surgery, Otorhinolaryngology, Pathology, Radiotherapy and Surgery from the University Hospital, Veterans Administration Hospital and the Oklahoma Medical Research Foundation. The opinions expressed are intended as suggestions for therapy. The final choice of treatment is the responsibility of the managing physician or service.

and was given antibiotics. He also received packed red cells and platelet transfusions during the period of severe leukopenia. Toward the end of that hospitalization, a brain scan and a liver scan were normal. The chest film was normal and a metastatic survey was negative. He underwent protoscopy and two of the colonic polyps were biopsied at 11 and 17 centimeters. The biopsies of the polyps were interpreted as atypical colonic mucosa suggestive of carcinoma, but the tissue was insufficient for diagnosis.

A remission of the leukemia was obtained and at the time of his discharge the hematocrit was 31 percent, white count was 5,100/mm^3 and he had 138,000 platelets/mm^3.

Since that time the patient has done well. He is re-admitted to the hospital at monthly intervals for a five day course of cytosine arabinoside as maintenance therapy for his leukemia. His blood count has been essentially normal at each admission and repeated bone marrow examinations have indicated that he is in complete remission. His most recent admission was in May, when he again reported one or two episodes of bright red blood coating his stool; otherwise he had no complaints. A barium enema was performed and revealed several polypoid lesions, some of which were suggestive of malignancy. A chem 16 on his last admission was normal. In summary, the patient has acute monomyeloblastic leukemia, in remission, with probable adenocarcinoma of the colon.

DOCTOR CONDIT: Any questions about the history? Doctor Joel, what about the pathological findings?

DOCTOR JOEL: We have a biopsy of the iliac crest bone marrow and two biopsies of the polyps. The bone biopsy reveals the marrow cavity to be filled with leukemic cells of either the myelocytic or monocytic series. Both biopsies of the rectal polyps show areas of probable malignant degeneration, as manifested by invasion of the stalk by atypical glandular formations.

DOCTOR CONDIT: Doctor Williams, how do you feel this patient should be handled?

DOCTOR WILLIAMS: If he did not have leukemia the management of this man would consist of excision of the polyps. Not because we fear that polypoid lesions that are benign will become malignant, but because we cannot tell from an x-ray examination which ones already are malignant. One or two of these lesions look fairly sessile and could be malignant. The presence of the leukemia of course is the complicating problem and affects our thinking in two ways. One question is whether his life expectancy is such that there is a reasonable chance that carcinoma of the colon, if present, will become a problem. Secondly, what effect would the anti-leukemic drugs which in effect are immuno-suppressive, have on the growth of the colon lesions? I would be interested in hearing what you think of the clinical course of the leukemia with the idea that if the course is relatively long then he should have treatment for the polyps just as he would have without them.

DOCTOR CONDIT: We haven't been using cytosine arabinoside long enough to know the prognosis for this disease. We have had ten out of 26 patients go into complete remission, two have been in complete remission for two years, eight are in complete remission now, while two relapsed after ten and 12 months respectively. I would estimate that we can look forward to a year and perhaps longer, of complete remission on the basis of our experience with other patients. I can't answer the question as to the immunosuppressive aspects of this therapy.

DOCTOR BOTTOMLEY: I think that cytosine arabinoside probably is not as immuno-suppressive as some of the other chemotherapeutic agents. Cytosine arabinoside acts primarily by blocking DNA synthesis. This produces rather profound depression of the polymorphonuclear leukocytes, which turn over rather rapidly, but has very little effect on the lymphocytes which turn over rather slowly. Recent reports would indicate that there is considerable depression of the immune response during the administration of the cytosine arabinoside but that this returns to normal within a short time after the drug is discontinued.

DOCTOR CONDIT: Doctor Williams, what are the odds that one of these polyps will become adenocarcinoma later?

DOCTOR WILLIAMS: I think that the chances are quite low that an isolated polyp will undergo malignant degeneration. The

important thing is whether we consider this patient to have familial polyposis. The incidence of malignant degeneration is much higher in patients with familial polyposis than it is in isolated polyps of the colon.

DOCTOR JOEL: There are several syndromes associated with polyposis. One of these is Gardner's Syndrome which is the association of polyps of the colon with osseous and soft tissue pseudo-tumors. Another interesting condition is Peutz-Jeghers Syndrome in which polyps may occur in the jejunum and other parts of the gastrointestinal tract associated with melanin spots on the lips, buccal mucossa and digits. Another condition is Cronkhite-Canada disease which is the association of polyposis of the gastrointestinal tract with diarrhea, protein loss, abdominal pain, hyperpigmentation of the skin and mucosa, alopecia, and atrophy of the fingers and toenails. This disease was first described by Cronkhite and Canada in 1955 in the *New England Journal of Medicine.* This condition is not familial as opposed to Gardner's Syndrome and Peutz-Jeghers Syndrome, both of which are autosomal dominant. Cronkhite-Canada disease occurs in children and is usually fatal in six to 18 months. Does the patient appear to have either Gardner's Syndrome or Peutz-Jeghers Syndrome?

DOCTOR BOTTOMLEY: No, he does not have either one of these syndromes. It is possible, however, that the relationship of the polyps of the colon and the acute leukemia is not coincidental and that this also represents some cellular defect which predisposes to malignant transformation. We do not, of course, have any information on his family to tell whether it is familial or not, but even if it is not, it is possible that this could represent a sporadic case produced by some type of mutation. In addition to the increased incidence of carcinoma of the colon in patients with familial polyposis, several families have been described with an apparent predisposition to develop carcinoma of the colon and endometrium, and we are currently following a family with an apparent predisposition to develop breast cancer, sarcoma, and acute leukemia.

DOCTOR WILLIAMS: But needless to say if this is familial polyposis, the surprising thing is that he hasn't developed carcinoma of the colon already.

DOCTOR CONDIT: From a technical standpoint, how large an operation would be required in this patient? He is in complete remission at the present time and could probably withstand such an operation without difficulty.

DOCTOR WILLIAMS: I think from what I've heard, that he ought to have an exploratory laparotomy and excision of the polyps.

DOCTOR PARKER: Well, I'm a little confused. I don't know whether this man has polyposis or if he has two or more polyps. I think that is the first thing one should determine. If he has polyposis, then practically all of the large bowel should be marked by slight elevation and it should have a pebbled appearance. If he has polyposis, you ought to do either a subtotal or a total colectomy. I wonder what the mucosa of the rectum looked like. Does it look pebbly?

DOCTOR CONDIT: The man who did the sigmoidoscopy is not here.

DOCTOR BOTTOMLEY: We will have that checked out.

DOCTOR CONDIT: Are there any other comments?

DOCTOR BOTTOMLEY: What about the possibility of following him with repeated barium enemas? Would this allow us to proceed with the surgery, if there appears to be progression of the lesions?

DOCTOR WILLIAMS: I agree with Doctor Parker that if the mucosa has the cobble stone appearance I think he should be considered to have familial polyposis. On the other hand if he doesn't, because of the concurrent diagnosis of acute leukemia, it would be acceptable to follow him with repeated barium enemas. My first choice is still surgical excision of the lesions, however.

DOCTOR PARKER: I think the size of the polyps is also a critical factor. If the polyps are over 1.5 cm in size, the chances of them being malignant are much greater and it would appear that several of these lesions are of that size.

DOCTOR BOTTOMLEY: Another question to answer is, when would be the best time to do the laparotomy in relationship to

his courses of cytosine arabinoside? It is given as a five day continuous infusion every month, and the patient is hospitalized during that period. Approximately a week following this, the maximum depression of the blood count occurs even with the maintenance course. Approximately two weeks after the course of cytosine arabinoside the blood count has started to recover. Perhaps the best time to consider surgery would be about two weeks following the last course. The blood count would be normal at that time and we would then have two weeks for him to recover from surgery before we give the next course of cytosine arabinoside.

DOCTOR WILLIAMS: How would that interfere with the remission of his leukemia?

DOCTOR BOTTOMLEY: This should not really affect his remission as he only receives the maintenance cytosine arabinoside every four weeks, and this would not interfere with the schedule. If it did interfere with the maintenance course, it might increase the chances for a relapse of leukemia.

FINAL DIAGNOSIS: Acute Monomyeloblastic Leukemia with multiple polyps of the colon with a suggestion of malignant degeneration of some of these polyps.

TUMOR BOARD RECOMMENATIONS: If the patient's remission from acute leukemia can be expected to last for over a year, he should have an exploratory laparotomy with surgical excision of the polyps. This should be scheduled so that the maintenance therapy for his acute leukemia is not compromised and also the blood count will be optimal for performance of the surgical procedure. If examination of the colonic mucosa indicates that the patient has polyposis, it may be necessary to do a total or subtotal colectomy. □

35th Annual Meeting

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January 28th-29th, 1971 **Convention Center**

San Antonio, Texas

GUEST SPEAKERS

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Internal Medicine—William B. Bean, M.D., Iowa City, Iowa

Internal Medicine (Hematology)—I. Brodsky, M.D., Philadelphia, Pennsylvania

Surgery—Carl R. Feind, M.D., New York, New York

Surgery—Isao Hirata, Jr., M.D., New Haven, Connecticut

Pediatrics—Aaron Grossman, M.D., Chicago, Illinois

Pathology—Henry J. Norris, M.D., Washington, D.C.

Surgery—John L. Ochsner, M.D., New Orleans, Louisiana

Internal Medicine (Cardiology)—Eduardo Salazar, M.D., Mexico City, D.F.

Neurosurgeon—James F. Toole, M.D., LaJolla, California

This entire program is acceptable for accredited hours by the American Academy of General Practice.

At the end of the two-day convention, a postgraduate seminar will be held in Mexico City. Complete details may be obtained from S. E. Cockrell, Jr., 202 West French Place, San Antonio, Texas 78212.

HEW Orders Medicare Payment Base Change

HEW has instructed all Medicare carriers to lift the "fee freeze" and update their customary charge levels for physician services. Starting January 1st some state physicians will find that Medicare is paying more of their billed charges.

Up until the first of this year customary charge limits had been frozen at the amount being allowed on December 31st, 1968. New regulations require the carriers to base the new limits on claims presented for processing between January 1st, 1969 and March 31st, 1970. Thus, any physician who had a fee increase in 1968 or sometime during the '69-'70 period should find that Medicare is paying more of his bill charge.

Where the Medicare records indicate that a physician increased his charge during the '69-'70 time period, his new customary charge will be established at the median level as related to the number of times the service was rendered at the different fees.

Upper limit on the new customary charge payments will be based on the 75 percent percentile of physicians' charges in a locality. Referred to as "prevailing charge limits," this means that Medicare will base its payment on the full charge billed by a physician if that charge is no higher than 75 percent of the customary charges made by all physicians of similar training in the locality for the particular service or medical procedure. As an example, if 75 percent of the fees for office visits being charged by physicians in a locality range between $8 and $12, then the Medicare "reasonable charge" will be whatever the physician customarily charged his patients—up to the $12 level.

This change to the 75th percentile for prevailing charge limits will be a downward change for Oklahoma physicians. In the past prevailing charge limits in Oklahoma were based on the 83rd percentile.

While HEW was instructing its carriers to update their customary charge limits for Medicare, they were instructing the Medicaid carriers to coordinate their physicians profile with the Medicare carriers. In Oklahoma this means that the Department of Public Welfare's physician profiles will be brought into line with those of the Medicare. This should alleviate some of the problem of carriers paying different fees for the same procedure.

A letter to all Oklahoma physicians from the Department of Welfare stated, "On and after January 1st, 1971, payments made by the Department will be made on the usual and customary within the allowable as determined by Aetna Life and Casualty Company." This company is the Medicare carrier for Oklahoma. The letter went on to state, "The determination of compensable services will be coordinated as closely as possible with Aetna Life and Casualty, . . ."

At the same time the Department of Welfare was making its announcement, it was also sending all Oklahoma physicians a new precedural terminology code book and requesting that the new codes in it be used on all Medicaid claims after January 1st. □

Al Capp Signed For Tulsa Meeting

America's favorite cartoonist, Al Capp, will be one of the featured speakers during the 1971 annual meeting of the OSMA. Slated for April 29th-May 1st, the meeting will be held in the Tulsa Assembly Center and the Fairmont-Mayo Hotel.

Floyd Miller, M.D., Chairman of the Annual Meeting Committee said, "We are very fortunate to get Mr. Capp, since he is one of the most popular speakers in America today."

The witty and caustic creator of Little Abner says of himself, "I am an authority on nothing with opinions on everything." For over thirty years, millions of Americans have shared their morning coffee with the population of Dog Patch.

Although Capp's forte is speaking to student groups, which he holds in very low regard, he has a strong appeal for all age groups whether he is ridiculing our foibles or criticizing our political policy. He works in an informal style, reading and answering questions from a stack of cards submitted by the audience. While his answers are caustic and witty, they show a great understanding of today's society.

Capp's talk, entitled "Ask Al Capp," will take place Saturday afternoon, May 1st, in the Tulsa Assembly Center. Admission to the talk will be limited to those persons registered for the meeting and to members of the Woman's Auxiliary.

No subject seems to be "off limits" or taboo for Capp's pointed comments. When asked whether marijuana should be legalized he snapped back, "By all means! Also murder, rape and arson—then we could do away with crime." John Kenneth Galbraith once asked him why he had "deserted liberalism." Capp answered, "I didn't desert it, you and Arthur Schlesinger kidnapped it."

His low opinion of today's college students is well known. He once said "To know them is to dislike them." On another occasion he commented, "The more I see of students, the less I like them." He once described a "concerned" college student as one who "smashes the computer at a university, and an 'apathetic' student is one who spends four years learning how to repair that computer."

Part of Capp's disdain for college students may stem from the fact that while he grew up in a ghetto, he pulled himself up from the depths of poverty to extraordinary success. He feels that today's college students are "privileged" compared to what he went through. □

Rural Health Study Planned

The Oklahoma State Medical Association's Rural Medical Council will carry out a pilot survey in the Southeastern part of the state in an effort to alleviate health personnel shortages.

Doctor Kelly M. West, former acting director of the Oklahoma Regional Medical Program, will be in charge of the project. The study will be based on identifying a regional medical service area and developing a system to improve the delivery of health services for the citizens residing in the area.

Doctor West says there are no preconceived plans as to how improvements can be made. "Much of the project will take form only after we have visited with the physicians now practicing in the area to be selected . . . even the geographic boundaries of the area to be studied will not be selected until consultations are held with practitioners now serving sparsely settled rural areas."

The problem came to light as a result of medical student loan programs where there is a contractural obligation to serve two years in a community of 5,000 or less population in lieu of repaying the loan. One loan program of this type is sponsored by the state government and another similar program is sponsored by the state medical association. There are presently seven medical students who are so committed.

When the students complete their training, the OSMA Rural Medical Council hopes to be ready to recommend practice opportunities which will be a part of a well-conceived plan to develop a regional medical service area.

It is believed that the survey and the resultant health service development program will increase the likelihood that students accepting rural loans will become permanent residents of rural Oklahoma.

Doctor West plans to begin the survey in March and has set May 31st for the completion date. The pilot survey in southeastern Oklahoma is expected to produce techniques which can then be applied toward developing similar programs in other rural areas. □

New Members Sought For Life Insurance Program

A new expanded benefit life insurance program is being offered to OSMA members. The new group term life insurance was recently announced by the association's Council on Insurance. Enrollment in the new program is growing rapidly.

A maximum life insurance benefit of $50,000 will be available up to age 60 at rates based upon age categories. The association's old program had a stable premium with an annually decreasing amount of term life insurance. Both programs are underwritten by the Massachusetts Mutual Life Insurance Company.

OSMA members insured under the old policy have the opportunity of electing to participate in the new program by submitting evidence of insurability. However, the old policy may be continued without any increase in cost or reduction of benefits.

The new improved program offers enlarged benefits at greatly reduced rates per $1,000 of coverage. Large amounts of accidental death benefits, in addition to basic life insurance coverage, will be featured in the new policy. Prior to age 60, the plan will pay a total of $150,000 for accidental death and a total of $250,000 if death occurs on a common carrier. In addition, benefits of up to $150,000 are available in the event of dismemberment or loss of sight.

Two hundred enrollees are needed to implement the new program. All members of the association were mailed a brochure outlining the new policy along with an application. Those physicians who cannot find their application, but who are interested in the program, should contact the OSMA executive office as soon as possible.

Premium rates for the new policy are as follows: For physicians age 30 and under, annual premium will be $100; 30-39 will have an annual premium of $200; 40-49, $400; 50-54, $700; 55-59, $1,000.

At age 60, the basic amount of life insurance drops from $50,000 to $25,000 with a corresponding drop in accidental death benefits to $75,000 and death on a common carrier to $125,000. Premium for the age category 60-64 is $800 annually.

Another decrease in benefits takes place at age 65 through 69. The amount of basic life insurance drops to $10,000, accidental death benefit drops to $30,000, and death on a common carrier to $50,000. Annual premium for this age category is $500.

Physicians may contact the OSMA executive office or Walter C. Wilson, CLU, Administrator, 1470 First National Bank Building, Oklahoma City, Oklahoma 73102. Telephone number: AC 405: 236-4681. □

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Eliel Named To Medical School Post

Leonard P. Eliel, M.D., 56, assumed duties December 1st as University of Oklahoma interim executive vice-president for OU Medical Center affairs and director of the OU Medical Center, succeeding the late John P. Colmore, M.D.

Doctor Eliel, associate director of the Medical Center and associate dean of the graduate college-medical center, was appointed by the OU Board of Regents following the death November 26th of Doctor Colmore, who had held the interim position since September 15th, 1970.

The new medical center executive was named to serve until there is a permanent appointment of a successor to James L. Dennis, M.D. Doctor Dennis resigned last summer to become University of Arkansas vice-president for health sciences, and a search committee was subsequently appointed to recommend persons for the vice-presidency.

Doctor Eliel went to the University of Oklahoma Medical Center in 1951 from Cornell University Medical College to become the first head of the Cancer Section of the newly-established Oklahoma Medical Research Foundation, a privately-supported institution on the medical campus.

He was affiliated with the OMRF 19 years, retiring in 1970 from the position of vice-president-director of research after concluding a sabbatical year teaching at the University of Washington Medical Center, Seattle.

Doctor Eliel joined the OU Medical Center administrative staff July 1st, 1970 as associate director and graduate college associate dean. His academic title is professor of medicine.

He is a diplomate of the Board of Internal Medicine and a fellow of the American College of Physicians.

Doctor Eliel is chairman of the Clinical Cancer Training Committee of the National Cancer Institute and a past-president (1968-69) of the Southwest Section, American Association for Cancer Research. □

Laboratory Program Available

Announcements of a Laboratory Survey Program for OSMA members have been mailed. The survey co-sponsored by OSMA and the College of American Pathologists is designed for physicians' offices. Called "Peer Evaluation Program" the survey provides four sets of specimens permitting as many as 76 laboratory tests. A set of 19 specimens is mailed to each participant in April, June, August and October. Results are tabulated and computerized reports are furnished as part of the program.

Physicians interested have until February 15th to enroll. The cost is $80.00. Eighty-four laboratories participated in a similar program last year which represented over 250 physicians.

OSMA Laboratory Quality Committee initiated the survey in 1969 after approval by the House of Delegates. □

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Laboratory Seminar Announced

"Peer Review in the Physician's Office Laboratory" will be the title of a Seminar planned by OSMA's Laboratory Quality Committee. Raymond F. Hain, M.D., Chairman of the committee said special invitations to attend the session had been extended to members of the association and their lab personnel who have participated in OSMA's Laboratory Survey Program. Approximately 84 laboratories enrolled in one of several programs conducted by the College of American Pathologists.

"It's hard to determine how many physicians the 84 groups represent," Doctor Hain stated, "however, the committee feels it's in excess of 250 which is a 316 percent increase over the 1969 program."

The committee reviews the reported results, establishes medically misleading values, and prepares a summary for participants. "Reports are anonymous and tabulated in a manner to reveal the overall performance of physicians' office laboratories which is exceptionally good," said Hain. "Of course, there's room for improvement, that's why we're having the seminar. Although this program is primarily for those who participated in the surveys, any member who wishes to attend is welcome," Doctor Hain said. The program will be constructed around topics the participants report to the committee as being important.

Tentative plans are for the seminar to be held in Oklahoma City, January 30. Those interested, other than participants, should contact the OSMA office. □

Second Drug Seminar Set For Pete's Place

Oklahoma's world famous family restaurant in Krebs, Pete's Place, will be the location of the second seminar on drug abuse. Scheduled for Thursday evening, February 11th, the seminar is one of six being sponsored by the OSMA's Alcoholism and Drug Abuse Committee to familiarize physicians with the short term diagnosis and treatment of drug intoxicated patients.

Six seminars were originally scheduled, the first was held in Enid on January 14th and the second will be in the McAlester area on February 11th. Other seminars will be held in Tulsa, Oklahoma City, Altus and the Lake Texhoma area. Exact dates and locations will be announced at a later time.

The meeting at Pete's Place will start at 6:30 p.m. Following dinner, a film entitled "A Nice Kid Like You" will be shown. This will be followed by a presentation from Jim Earls, M.D., on "Acute Symptoms and Management of Drug Users."

A panel discussion with questions from the audience will close out the meeting. Faculty for the meeting is as follows: Jim Earls, M.D., Associate Professor of Psychiatry; Al Parades, M.D., Professor of Research Psychiatry; Tom Donica, M.D., Associate Professor of Psychiatry; and Raul Chanes, M.D., Clinical Associate Professor of Med-

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icine, all of the OU Medical Center.

Frank Adelman, M.D., Enid psychiatrist, is chairman of a special subcommittee which organized and planned the entire program. Doctor Adelman will act as moderator.

The seminar is good for two and one-half hours of credit from the American Academy of General Practice.

Registration fee for each of the seminars will be $10, to cover the cost of the meal and program expense. Material for advance registration will be sent to physicians in the area surrounding each seminar site.

Prior to each seminar all physicians in the area will receive a copy of a new booklet on the diagnosis and treatment of the drug intoxicated patient. The book has been compiled and published by the OSMA. □

"Doctor of the Day" Well Received and Busy

Members of both the Oklahoma Senate and House of Representatives have expressed their appreciation to the OSMA for the volunteer "Doctor of the Day" program. During each legislative session the medical association equips and stocks a first aid station on the fourth floor of the State Capitol Building to serve all members of both Houses.

The physician, known as "Doctor of the Day," volunteers to come to the Capitol Building and serve one day. He is introduced at the opening session of both Houses and is allowed on the floor of the House and Senate while they are in session. This is a privilege afforded to few persons.

Physicians interested in serving during the month of February and March are asked to contact Ed Kelsay, Associate Executive Director of the OSMA, for further information. Since the doctor serves only while the two Houses are in session, this limits service days to Monday through Thursday of each week. The legislature adjourns at Thursday noon and goes home.

A "Nurse of the Day" is also on hand to assist the doctor and is a volunteer sponsored by the Oklahoma State Nurses Association. □

"Super Board" Proposed By Tulsa Senator

Senator Peyton Breckinridge, Tulsa, plans to introduce legislation abolishing 23 State Boards and Agencies responsible for licensing various professions and occupations. In lieu of the individual boards there would be created an omnibus "Department of Occupational Licensing."

The State Board of Medical Examiners is included in the bill.

OSMA representatives have met with the Senator to discourage introduction of the measure, but apparently to no avail.

Should the bill be filed, it will certainly be one of the most controversial proposals in years.

The "Super" Department will have a director, appointed by the Governor, and will be assisted by several appointed boards. Each board will have five members, three practitioners of the occupation licensed and two representatives of the general public. The boards would be advisory to the director.

The potential chaos created by such a radical change in licensing procedures is indeterminable but speculation has generated an uproar among those named in the bill.

Senator Breckinridges' purpose in proposing the legislation is vague, however he feels the "agency" will be more "responsive to the public" and will produce savings for the state. Most state boards are self-financing through license fees.

OSMA's Legislative Committee will meet to discuss the bill in the near future. □

DEATHS

EVANS E. TALLEY, M.D.
1905-1970

Enid surgeon, Evans E. Talley, M.D., died December 12th, 1970, in Enid. A native Oklahoman, Doctor Talley graduated from the University of Oklahoma School of Medicine in 1933, where he later became a faculty member.

In 1937 he established his practice in Enid where he remained except for his service with the Army Medical Corps during World War II.

Doctor Talley had served as president of the OU School of Medicine Alumni Association; was a Fellow of the American College of Surgeons; and a member of the Alpha Omega Alpha.

HULL W. BUTLER, M.D.
1880-1970

A retired, Oklahoma City internist, Hull W. Butler, M.D., died December 5th, 1970. A native of Kempton, Indiana, Doctor Butler received his medical degree from Tulane University School of Medicine in 1922. He was certified by the American Board of Internal Medicine. In 1960 the OSMA presented Doctor Butler with a Life Membership, recognizing the outstanding service he had given to the medical profession and to humanity.

JOHN B. MOREY, M.D.
1904-1970

John B. Morey, M.D., 66-year-old, Ada physician, died November 25th, 1970 in Ada. Born in Dansville, New York, Doctor Morey was graduated from the University of Buffalo School of Medicine in 1927. Following postgraduate training at the Mayo Clinic, Doctor Morey established his practice in Ada. This practice was interrupted only by 29 months of services overseas during World War II. □

Book Reviews

MANIC DEPRESSIVE ILLNESS. By George Winokur, A.B., M.D., Paula J. Clayton, B.S., M.D., and Theodore Reich, B.Sc., M.D., C. M. St. Louis: The C. V. Mosby Company, 1969. $6.50.

This book is the report of a study of manic depressive illness based on the author's experience with 61 persons whose manic depressive illness is more strictly defined than is customary in studies of affective psychotic disorders, i.e., the index cases all presented with mania.

I greeted this attempt at precision with some enthusiasm since I have never felt the justification for the use of the term "manic depressive disease" in those individuals who do not show alteration of mania and depression, and certainly could not rationalize the term for persons experiencing only melancholias. This chronic confusion appears to have evolved from and obtained legitimacy via Kraeplin's 1921 monograph in which he suggested that almost any insanity "with a good prognosis and no deterioration could reasonably be thought of as manic depressive disease."

By using what is referred to as the family study method (interviewing the specific family members about themselves), the clinicians develop data which support the hypothesis that the affective disorder in which mania occurs is linked on the X-chromosome with the locus for color blindness. This conclusion is apparently the climax of the essay and is, in my opinion, the most striking aspect of the book which could make it worth while to the scholar of manic depressive illness.

The elegant development of a probable genetic factor in the disorder is unaccompanied by any substantial appreciation of those temperamental developmental, familial, intrapsychic and life experience factors which could also be integrated into a full spectrum understanding of the type of person whose emotional development and character structure would incline him toward a manic disruption. I mourn the missed opportunity in this study to obtain the type of information which a dynamically-oriented research team could have elicited. While I would not dispute their conclusions as to the genetic factors which may be at work in the production of this disorder, I cannot accept such a limited conceptual basis of etiology. I suspect that the essentials of my criticism are the product of a variation in perspective which usually allows me to discern a wide assortment of factors in an individual's total life experience which can be woven into a balanced formulation of etiology. Of course, one might argue that to some extent we "cause" our findings and conclusions and that those of us who find dynamic factors are using a type of microscope which is different from those who do not find such elements in their analysis. I am too aware that this is true and my awareness has been furthered by reports of various approaches to studies of family systems and their dynamics (i.e., a new type of "microscope"). We must still await their application to family systems (including their several generations) manifesting the many stigmata of depressive dynamics.

Also disappointing are the chapters on prognosis and therapeutics. The follow-up is very short (18 to 36 months) and the sample approximately 50 percent of the original survey group. I have the distinct impression of the authors' being so enthralled by their genetic studies and conclusions that the remainder of the effort to focus on their subject lost its impetus. This blurred closure combines with the other limitations of the study (and small-sized print of the text) to leave this reader with a sense of strain and incompleteness.

The authors have worked very hard to abstract and more sharply define the accumulated writing on the manic depressive disorders. I find that their efforts yield very little which is unique or useful either conceptually or therapeutically. If one is seeking a handbook which makes an attempt to delineate what "classical" features and relationships are observed within the distinct category of manic depressive (bi-polar) illness, this work is successful in its attempt and will be pleasing to the reader. *Joseph B. Ruffin, M.D.*

INSTRUCTIONAL COURSE LECTURES. Vol. XIX by The American Academy of Orthopedic Surgeons, cloth, 236 pp. with 436 illustrations. St. Louis: The C. V. Mosby Company, 1970. $19.50.

This book represents a selection of the information presented at the instructional course lectures at the annual meeting of the American Academy of Orthopedic Surgery in New York City, in January, 1969. The 13 topics were selected from over 110 courses.

The decision to resume the previous practice of publishing material from selected courses in a separate volume, rather than in the *Journal of Bone and Joint Surgery*, has been met with mixed emotions. Review articles so necessary for teaching and for good patient care may be included in a separate volume where they might be omitted in the *Journal of Bone and Joint Surgery*. The availability of the courses in one volume will facilitate easy location and review. Certainly they will not be read by as many practitioners as would have read the same material in the monthly Journals.

The quality of material presented offers something for everyone interested in orthopedic surgery. While the resident will necessarily read the entire volume, the medical student will find valuable material in "Surgical Anatomy and Exposure of the Foot and Ankle" by Joyce and Hasty, "The Incidence and Prevention of Thromboembolic Disease" by Harris, and "Fractures in Children" by Griffin and Hamilton. The orthopedic practitioner will find helpful the articles on "Unstable Intertrochanteric Fractures" by Banks, Dimon, Hughston & Hoyt (although this has previously been published elsewhere), and "Troublesome Fractures and Dislocations of the Hand" by Stark. "Clinical and Pathologic Studies of Fat Embolism" by LeQuire, Hillman, Grey & Snoden, "Clinical Application of Electrodiagnostic Studies" by

Hejna, and "The Articular Cartilages a Review" by Mankin represent excellent basic science reviews. *Pat Evans, M.D.*

MECHANISMS OF TOXICITY. British Medical Journal, 25 September 1969. $6.50.

This is an interesting collection of some 16 papers which review various types of toxic agents in relationship to what is known regarding the molecular reactions of each substance. The subjects range from toxicity due to protein binding to a discussion of the effects of the drugs on body regulatory systems. The papers are in review form and are well referenced. They provide the reader with a concise picture of the complexities of toxic reactions based on recent investigations. This volume will be of interest to clinicians and workers in the field of toxicology or clinical pharmacology. *Harris D. Riley, Jr., M.D.*

SYNOPSIS OF CLINICAL CANCER. By Condict Moore, M.D., Professor of Surgery (Oncology), Associate in Pathology, University of Louisville School of Medicine. Second edition, cloth, 267 pages with 37 illustrations. St. Louis: The C. V. Mosby Company, 1970. $11.75.

The author brings 20 years of experience in the cancer field to this, the second edition of this book. Easily readable by those who do not consider themselves cancer therapists, this work lends itself to the task of supplying the general physician with facts and figures illustrative of available techniques and results of oncologic therapy.

Clinically oriented, an orderly review of cancer in each organ system is briefly covered and an overview of the more common childhood tumors, though limited, rounds out the well presented material.

This synopsis could be considered a must for physicians concerned with this field. It accomplishes the authors' intended task of "an introduction to cancer, a first reference or a handy review." *Ben C. Pendarvis, M.D.* □

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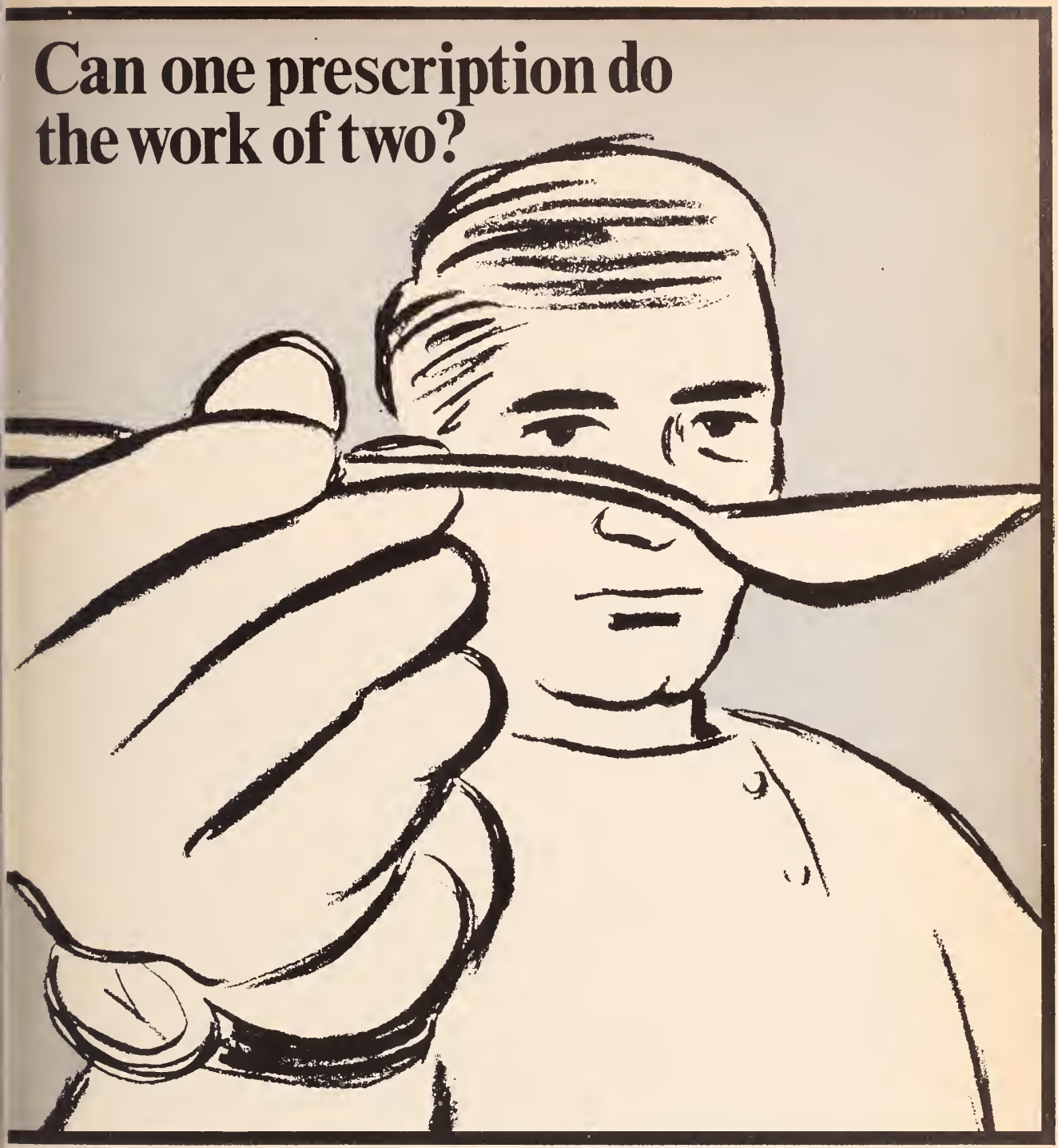
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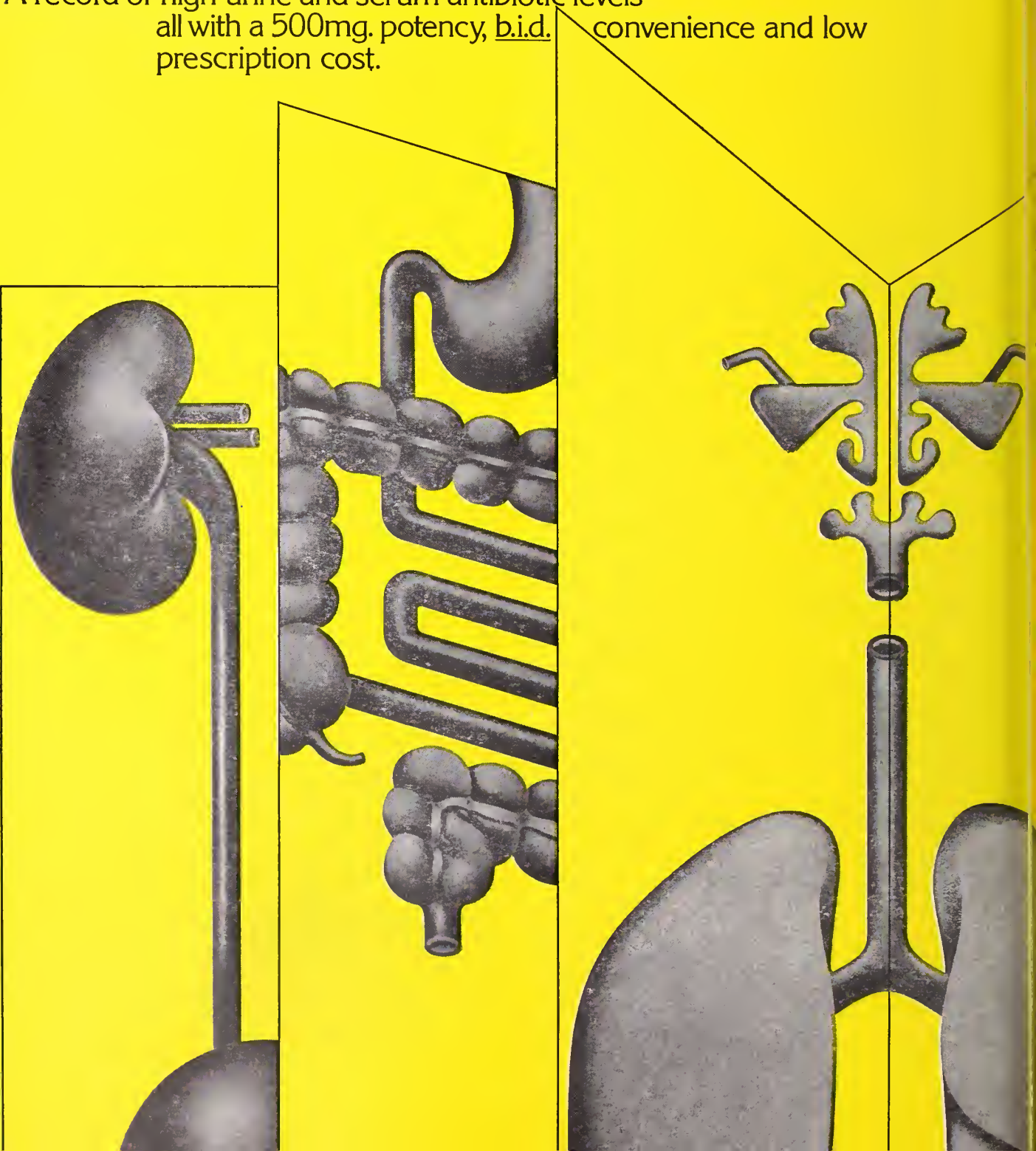
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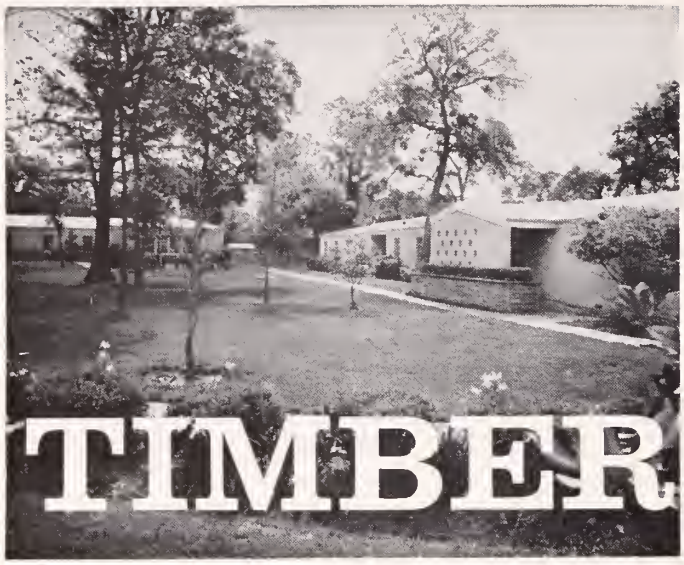
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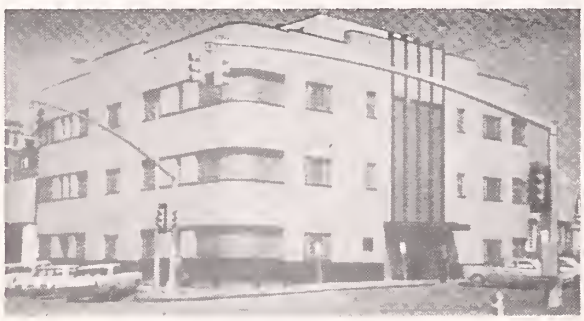
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The JOURNAL *of the Oklahoma State Medical Association*

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May Issue

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Premiums paid by Medicare beneficiaries under Part B will rise from $5.30 per month to $5.60 beginning July 1st. In making the announcement HEW Secretary Elliot Richardson said the increase "is the net result of three items that are estimated to increase cost by 50c in fiscal year 1972, and then a reduction of 20c arising primarily because of the reduced margin for contingencies." A rise of 6.7 percent in the level of physicians' fees recognized by the program is estimated for fiscal 1972, HEW said. It also expects an increase of two percent in the use of physicians' services and a 15 percent increase in cost and utilization of institutional services covered under Part B.

Washington rumor has it that Vice-President Spiro Agnew will become the Nixon administration spokesman for health care. Although HEW's secretary Elliot Richardson will continue to direct the working end of health programs at HEW, Agnew is expected to become the "front man." He reportedly has been tapped by President Nixon to serve as the spokesman and coordinator in the White House's domestic council for the health effort planned by Nixon for 1971.

Nixon's health plan is being worked out by high echelon staff people at HEW and the White House. A big stumbling block is the family health insurance plan which the administration has promised to propose as a substitute for much of Medicaid. As usual, the problem is how to finance the new plan. One possibility under consideration is an ear marked increase in cigarette taxes. Also being worked out is the catastrophic health insurance plan and a comprehensive medical education program aimed at relieving the doctor shortage. A chief objective of the entire health plan will be achieving results with innovation rather than substantial new expenditures.

A national medical academy may be up for consideration again. With the death of L. Mendell Rivers, Representative F. Edward Herbert became chairman of the House Arms Services Committee. One of Herbert's long cherished dreams is the establishment of a military medical school in the Washington area. Proposals to abolish the draft may give his idea a boost, since without the selective service system to pressure doctors into military service, new means of supplying the armed forces with medical personnel will have to be found.

Taxpayers need a law to protect them against laws designed to protect taxpayers. A prime example is a law in the state of New York which was designed to prevent New Yorkers from being charged inflated bills for clinical laboratory work. The law, opposed by the medical society of the state of New York, requires clinical labs to bill patients directly. Laboratory charges to patients have more than doubled since the law went into effect last July 1st. At the root of the current problem are spiraling overhead costs that insued when laboratories converted to the new billing system. Previously laboratories billed physicians monthly for all tests. The new system has produced a bookkeeping nightmare and has been aggravated by delinquencies. To meet rising overhead expense, laboratories have found it necessary to increase charges sharply for tests. □

anxiety: the tyrant

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The antianxiety action of Librium® (chlordiazepoxide HCl)—used adjunctively or alone—has demonstrated clinical usefulness in virtually every field of medical practice where anxiety complicates the patient's condition.



for the patient ruled by anxiety

Librium® (chlordiazepoxide HCl) 5-mg, 10-mg, 25-mg capsules

Before prescribing, please consult complete product information, a summary of which follows:
Indications: Indicated when anxiety, tension and apprehension are significant components of the clinical profile.
Contraindications: Patients with known hypersensitivity to the drug.
Warnings: Caution patients about possible combined effects with alcohol and other CNS depressants. As with all CNS-acting drugs, caution patients against hazardous occupations requiring complete mental alertness (e.g., operating machinery, driving). Though physical and psychological dependence have rarely been reported on recommended doses, use caution in administering to addiction-prone individuals or those who might increase dosage; withdrawal symptoms (including convulsions), following discontinuation of the drug and similar to those seen with barbiturates, have been reported. Use of any drug in pregnancy, lactation, or in women of childbearing age requires that its potential benefits be weighed against its possible hazards.
Precautions: In the elderly and debilitated, and in children over six, limit to smallest effective dosage (initially 10 mg or less per day) to preclude ataxia or oversedation, increasing gradually as needed and tolerated. Not recommended in children under six. Though generally not recommended, if combination therapy with other psychotropics seems indicated, carefully consider individual pharmacologic effects, particularly in use of potentiating drugs such as MAO inhibitors and phenothiazines. Observe usual precautions in presence of impaired renal or hepatic function. Paradoxical reactions (e.g., excitement, stimulation and acute rage) have been reported in psychiatric patients and hyperactive aggressive children. Employ usual precautions in treatment of anxiety states with evidence of impending depression; suicidal tendencies may be present and protective measures necessary. Variable effects on blood coagulation have been reported very rarely in patients receiving the drug and oral anticoagulants; causal relationship has not been established clinically.
Adverse Reactions: Drowsiness, ataxia and confusion may occur, especially in the elderly and debilitated. These are reversible in most instances by proper dosage adjustment, but are also occasionally observed at the lower dosage ranges. In a few instances syncope has been reported. Also encountered are isolated instances of skin eruptions, edema, minor menstrual irregularities, nausea and constipation, extrapyramidal symptoms, increased and decreased libido—all infrequent and generally controlled with dosage reduction; changes in EEG patterns (low-voltage fast activity) may appear during and after treatment; blood dyscrasias (including agranulocytosis), jaundice and hepatic dysfunction have been reported occasionally, making periodic blood counts and liver function tests advisable during protracted therapy.

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LABORATORIES
Division of Hoffmann-La Roche Inc.
Nutley, New Jersey 07110

BALCONY

JOURNAL
OKLAHOMA STATE MEDICAL ASSOCIATION

Volume 64
Number 2
February 1971



Menrium® treats the menopausal symptoms that bother him most.

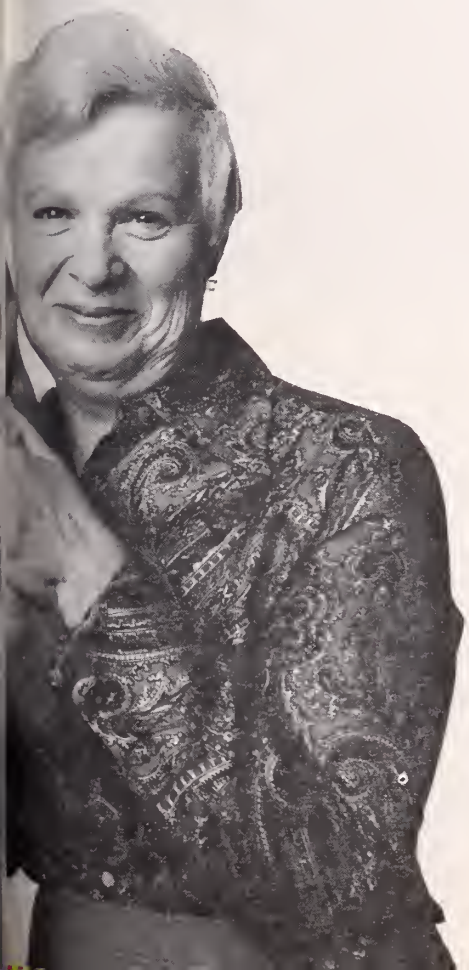


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. His wife has a lot of different menopausal symptoms, but only a few really irritate *him*. Her hot flashes, her vertigo, her palpitations—that's *her* problem. What really bothers him is her nervousness, her irritability and her excessive anxiety, often expressed by endless "book-shuffling, chain-smoking, reading-lamp" insomnia!

Menrium takes care of hot flashes, vertigo, palpitations in most menopausal women. Menrium provides the well-known antianxiety action of chlordiazepoxide (Librium®) and water-soluble esterified estrogens. It therefore relieves more symptoms than either component separately. It takes care of the vasomotor symptoms as well as the emotional symptoms. This means the symptoms that bother his wife most. And the symptoms that irritate him most.

So, to help them both get through *her* menopause, remember Menrium.



Before prescribing, please consult complete product information, a summary of which follows:

Indications: Management of manifestations generally associated with the menopausal syndrome—anxiety and tension, vasomotor complaints and hormonal deficiency states.

Contraindications: Women with cancer of breast or genitalia, except inoperable cases, and those with known hypersensitivity to chlordiazepoxide and/or esterified estrogens.

Warnings: Caution patients about possible combined effects with alcohol and other CNS depressants. As with all CNS-acting drugs, caution patients against hazardous occupations requiring complete mental alertness (*e.g.*, operating machinery, driving). Exclude other possible causes of menopausal syndrome manifestations, such as pregnancy. Though physical and psychological dependence have rarely been reported on recommended doses, use caution in administering to addiction-prone individuals or those who might increase dosage; withdrawal symptoms (including convulsions) similar to those seen with barbiturates have been reported following discontinuance of chlordiazepoxide HCl. Potential benefits of use in pregnancy, lactation or women of childbearing age should be weighed against possible hazards to mother and child. Clinical data inadequate on safety in pregnancy.

Precautions: In elderly and debilitated patients, limit dosage to smallest effective amount of chlordiazepoxide (initially 10 mg or less per day) to preclude ataxia or oversedation; increase gradually as needed and tolerated. Though generally not recommended, if combination therapy with other psychotropics seems indicated, carefully consider individual pharmacologic effects—particularly in use of potentiating drugs such as MAO inhibitors and phenothiazines. Observe usual precautions in patients with impaired renal or hepatic function. Paradoxical reactions to chlordiazepoxide (*e.g.*, excitement, stimulation and acute rage) have been reported in psychiatric patients. Employ usual precautions in the treatment of anxiety states with evidence of impending depression; suicidal tendencies may be present and protective measures necessary. Variable effects on blood coagulation very rarely reported in patients receiving Librium® (chlordiazepoxide) and oral anticoagulants.

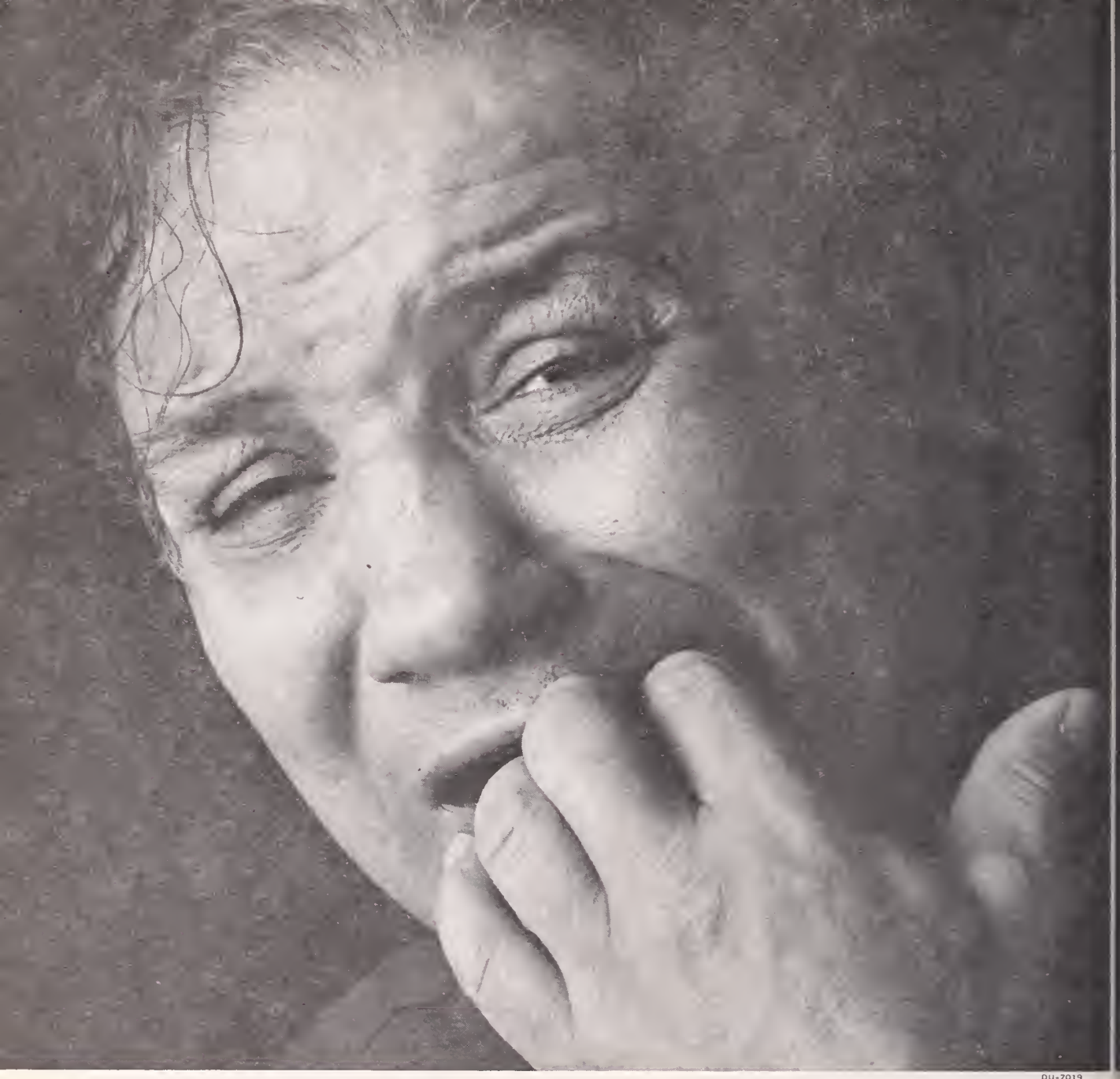
Adverse Reactions: Untoward effects seen with either compound alone may occur with Menrium. With chlordiazepoxide, drowsiness, ataxia and confusion reported in some patients, particularly in the elderly and debilitated; while usually avoided by proper dosage adjustment, these are occasionally observed at lower dosage ranges. Also reported have been a few instances of syncope; isolated occurrences of skin eruptions, edema, minor menstrual irregularities, nausea and constipation, extrapyramidal symptoms, increased and decreased libido, and occasional reports of blood dyscrasias, including agranulocytosis, jaundice and hepatic dysfunction. Periodic blood counts and liver function tests advisable during protracted treatment. Changes in EEG patterns (low-voltage fast activity) observed during and after chlordiazepoxide treatment.

With estrogens, headache, nausea and vomiting, anorexia, gastrointestinal discomfort, dysuria and urinary frequency, jitteriness, breast engorgement, formation of breast cysts, skin rashes and pruritus occasionally seen. Administration may also be associated with uterine bleeding and/or followed by withdrawal bleeding.

Usual Dosage: One tablet t.i.d. for 21 days, followed by one-week rest periods.

Menrium® T.I.D.

5 mg chlordiazepoxide	5-2	0.2 mg water-soluble esterified estrogens
5 mg chlordiazepoxide	5-4	0.4 mg water-soluble esterified estrogens
10 mg chlordiazepoxide	10-4	0.4 mg water-soluble esterified estrogens



DU-7019

Who's afraid of the big bad enema?

We all are. But Dulcolax is the cure for enemaphobia. It can do almost anything an enema can – except look scary.

Just one suppository usually assures a predictable bowel movement in 15 minutes to an hour. Gone are the tubing, the "accidents", and the bruised egos associated with enemas.

For preoperative preparation, the combination of tablets at night and a suppository the next morning usually cleans the bowel thoroughly. Suppositories may also be particularly helpful when straining should be avoided as in postoperative care.

As with any laxative, abdominal cramps are occasionally noted. The drug is contraindicated in the acute surgical abdomen.

Dulcolax®...it's predictable

bisacodyl

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The JOURNAL of the Oklahoma State Medical Association

FEBRUARY 1971
Vol. 64, No. 2

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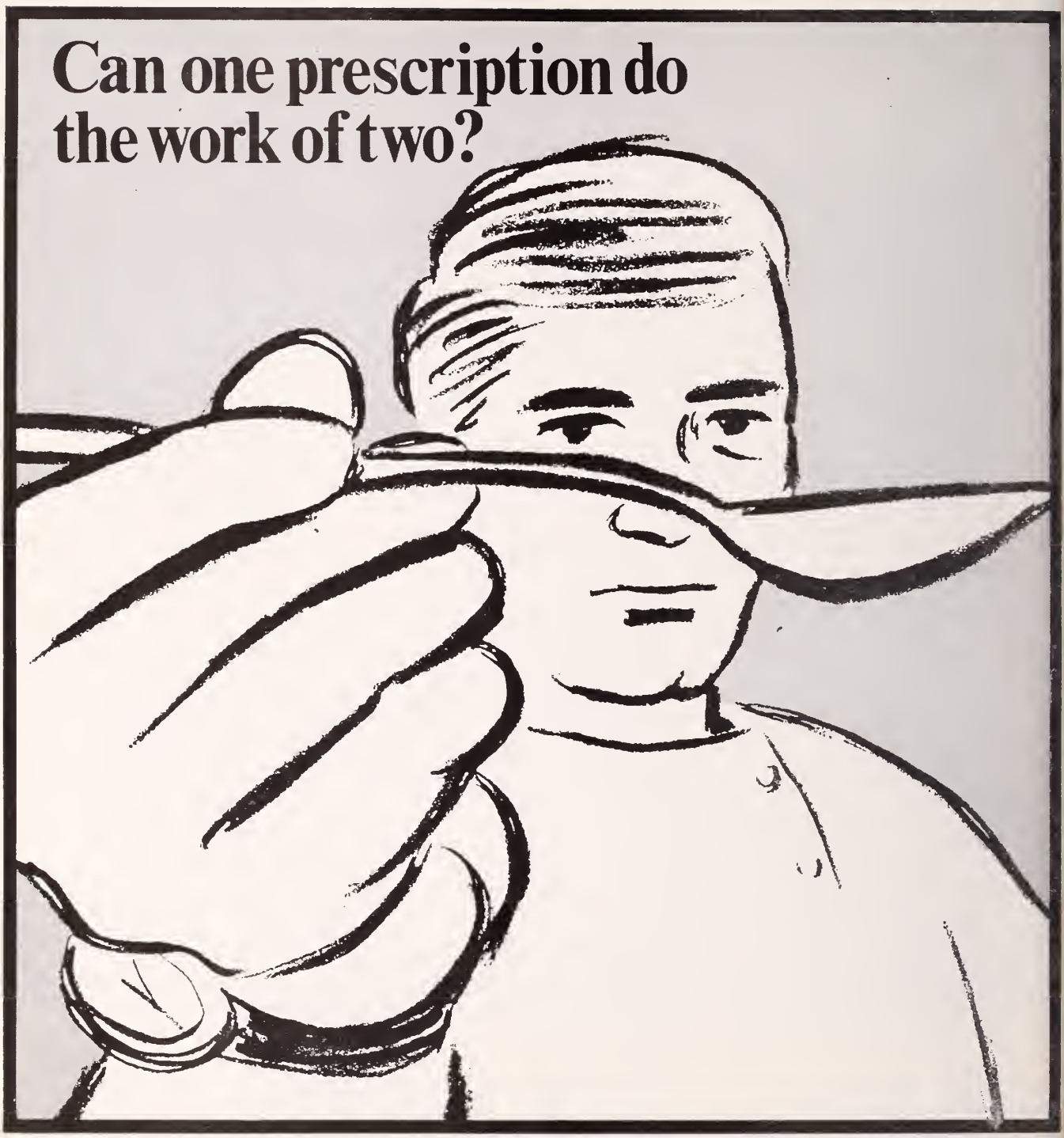
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Can one prescription do the work of two?



Yes, Kolantyl®.

Kolantyl Gel/Wafers contain
aluminum hydroxide/magnesium hydroxide, and
Bentyl® (dicyclomine hydrochloride) too.

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When Preventing Constipation is a Concern . . .



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SURFAK®

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(stool softener)

Surfak prevents constipation:

- **naturally**
  - . . . without bowel distention
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- **conveniently**—one 240 mg. capsule per day
- **economically**—costs less per effective daily dose*

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*based on actual drug store survey of prescribed dosages

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Somerville, N.J. 08876 U.S.A.

C-166

in cardiac edema

Dyazide®

Trademark

Each capsule contains 50 mg. of Dyrenium® (brand of triamterene) and 25 mg. of hydrochlorothiazide.

gets the water out

spares the potassium

Before prescribing, see complete prescribing information in SK&F literature or *PDR*.

Indications: Edema associated with congestive heart failure, cirrhosis of the liver, the nephrotic syndrome, late pregnancy; also steroid-induced and idiopathic edema, and edema resistant to other diuretic therapy. 'Dyazide' is also indicated in the treatment of mild to moderate hypertension.

Contraindications: Pre-existing elevated serum potassium. Hypersensitivity to either component. Continued use in progressive renal or hepatic dysfunction or developing hyperkalemia.

Warnings: **Do not use dietary potassium supplements or potassium salts unless hypokalemia develops or dietary potassium intake is markedly impaired.** Enteric-coated potassium salts may cause small bowel stenosis with or without ulceration. Hyperkalemia (>5.4 mEq/L) has been reported in 4% of patients under 60 years, in 12% of patients over 60 years, and in less than 8% of patients overall. Rarely, cases have been associated with cardiac irregularities. Accordingly, **check serum potassium during therapy, particularly in patients with suspected or confirmed renal insufficiency (e.g., certain elderly or diabetics). If hyperkalemia develops, substitute a thiazide alone. If spironolactone is used concomitantly with 'Dyazide', check serum potassium frequently**—they can both cause potassium retention and sometimes hyperkalemia. Two deaths have been reported in patients on such combined therapy (in one, recommended dosage was exceeded; in the other, serum electrolytes were not properly monitored). Observe regularly for possible blood dyscrasias, liver damage or other idiosyncratic reactions. Blood dyscrasias have been reported in patients receiving Dyrenium (triamterene, SK&F). Rarely, leukopenia, thrombocytopenia, agranulocytosis, and aplastic anemia have been reported with the thiazides. Watch for signs of impending coma in acutely ill cirrhotics. Thiazides are reported to cross the placental barrier and appear in breast milk. This may result in fetal or neonatal hyperbilirubinemia, thrombocytopenia, altered carbohydrate metabolism and possibly other adverse reactions that have occurred in the adult. When used during pregnancy or in women who might bear children, weigh potential benefits against possible hazards to fetus.

Precautions: Do periodic serum electrolyte and BUN determinations. Do periodic hematologic studies in cirrhotics with splenomegaly. Antihypertensive effects may be enhanced in postsympathectomy patients. The following may occur: hyperuricemia and gout, reversible nitrogen retention, decreasing alkali reserve with possible metabolic acidosis, hyperglycemia and glycosuria (diabetic insulin requirements may be altered), digitalis intoxication (in hypokalemia). Use cautiously in surgical patients. Concomitant use with antihypertensive agents may result in an additive hypotensive effect.

Adverse Reactions: Muscle cramps, weakness, dizziness, headache, dry mouth; anaphylaxis; rash, urticaria, photosensitivity, purpura, other dermatological conditions; nausea and vomiting (may indicate electrolyte imbalance), diarrhea, constipation, other gastrointestinal disturbances. Rarely, necrotizing vasculitis, paresthesias, icterus, pancreatitis, and xanthopsia have occurred with thiazides alone.

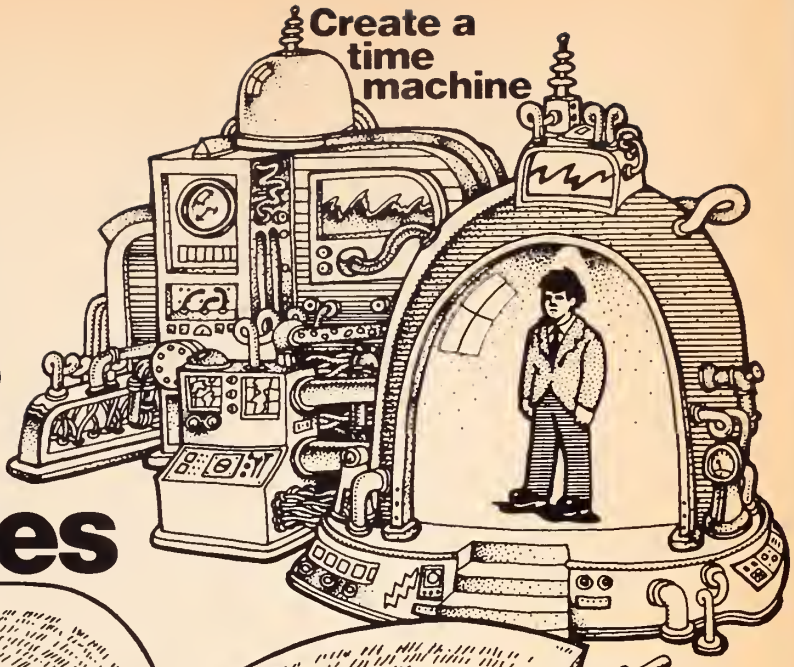
Supplied: Bottles of 100 capsules.

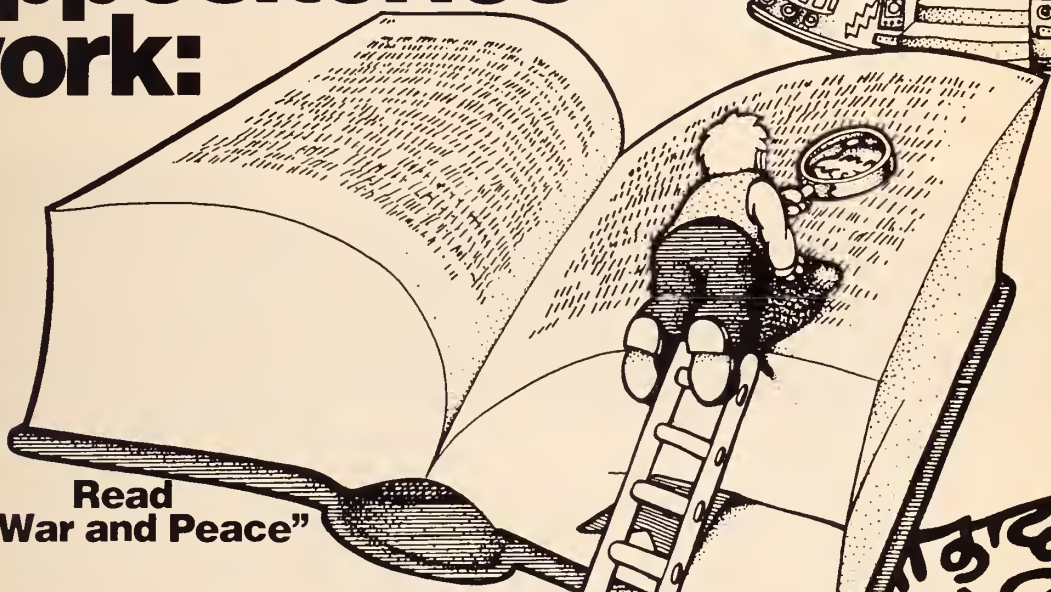
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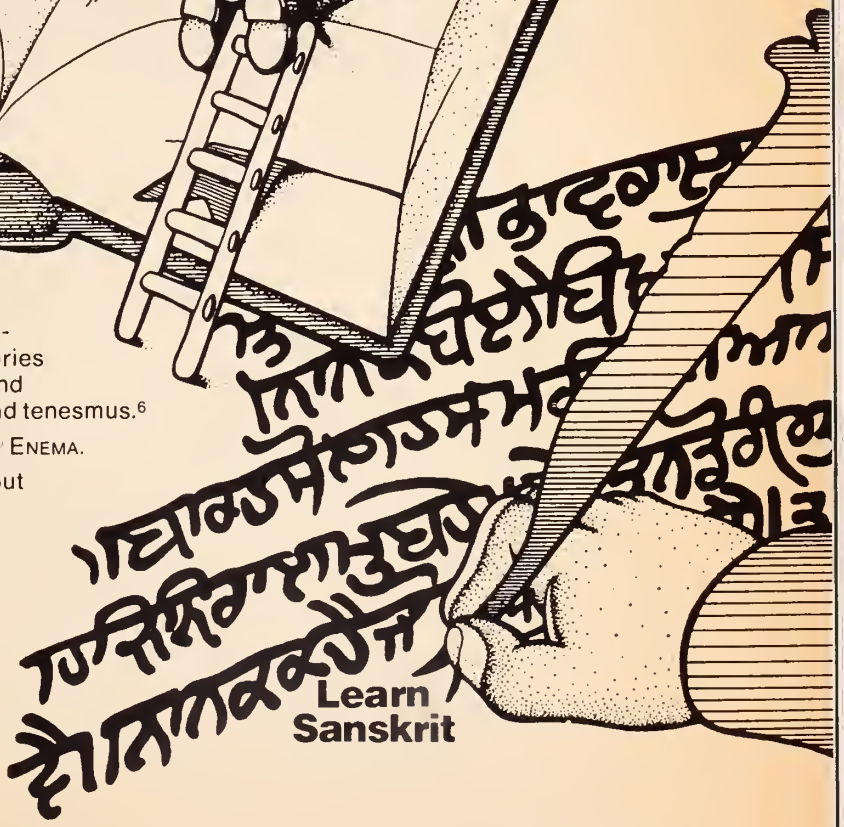
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DZ-108

What to do until suppositories work:







Actually, on the average, evacuant suppositories take about an hour to work.[1-3] Sometimes two.[4] Sometimes more.[3] Also, suppositories can be ineffective in up to 38% of patients,[5] and not infrequently produce smarting, burning and tenesmus.[6]

Alternative to the long unpleasant wait: FLEET® ENEMA.

FLEET ENEMA works within 2 to 5 minutes without pain or spasm. FLEET ENEMA induces a physiological pattern of evacuation, unlike purgatives and laxatives that may liquefy the stool. FLEET ENEMA avoids the irritation common with soapsuds enema. And FLEET ENEMA is leakproof: a rubber diaphragm at the base of the prelubricated tube prevents seepage and controls the rate of flow, assuring comfortable administration.

FLEET ENEMA. Regular and pediatric. Both completely disposable—like suppositories, only better. Much better.



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Lynchburg, Va. 24505

fleet pharmaceuticals

Warning: Frequent or prolonged use of enemas may result in dependence. Take only when needed or when prescribed by a physician. Do not use when nausea, vomiting or abdominal pain is present.
Caution: Do not administer to children under two years of age unless directed by a physician.

References: 1. Blumberg, N.: Med Times 91:45, Jan., 1963. 2. Sweeney, W. J., III: Amer J Obstet Gynec 85:908, Apr. 1, 1963. 3. Weinsaft, P.: J Amer Geriat Soc 12:295, Mar., 1964. 4. Baydoun, A. B.: Amer J Obstet Gynec 85:905, Apr. 1, 1963. 5. Feder, I. A., Flores, A. and Weiss, J.: Amer J Gastroent 33:366, Mar., 1960. 6. Smith, J. J. and Schwartz, E. D.: Western J Surg 72:177, May-June, 1964.

Efudex®
(fluorouracil)
cream/solution

In the treatment of solar/actinic keratoses–
An alternative to cold, fire and steel

2/23/68
Before treatment with 5% 5-FU cream. Patient R. G., 78 years old, shows extensive skin changes due to weathering and severe solar/actinic keratoses.

3/26/68
Following one month of therapy. Intense erythematous reaction is seen at sites of keratoses. Normal skin has not reacted. Some areas which had reacted initially have undergone healing despite continued topical application of 5% 5-FU.

6/11/68
Ten weeks after discontinuance of therapy. All areas have healed completely. Residual mild erythema remains in some areas. This patient also had seborrheic keratoses which, as expected, have not reacted. There is no evidence of residual lesions or recurrences.



ROCHE

Roche Laboratories
Division of Hoffmann-La Roche Inc.
Nutley, N.J. 07110

An alternative to conventional therapy

Efudex (fluorouracil) offers the physician a topical alternative to cryosurgery, electrodesiccation and cold-knife surgery in the treatment of solar/actinic keratoses. It is effective, comparatively inexpensive and especially well suited for treatment of these multiple lesions. Important, too, is the highly desirable cosmetic result. Clinical experience demonstrates that treatment with Efudex results in an extremely low incidence of scarring.*

Highly effective

In clinical trials, depending on the dosage form and strength used, complete involution occurred in 77 to 88 per cent of lesions following treatment. The rate of recurrence was low, ranging from 1.7 to 5.6 per cent up to a year after completion of therapy. When new lesions appeared, repeated courses of Efudex therapy proved effective.*

Predictable therapeutic response

Two to four weeks constitutes a typical course of Efudex therapy. The response is usually characteristic and predictable. After three or four days of treatment, erythema begins to appear in the area of keratoses. This is followed by an intense inflammatory response, scaling and occasionally moderate tenderness or pain. The height of the inflammatory reaction generally occurs two weeks after the start of therapy, and then begins to subside as treatment is stopped. Within two weeks of discontinuing medication, the inflammation is usually gone. A mild erythema may remain for two or three months before gradually receding. Since this response is so predictable, lesions which do not respond should be biopsied.

Two strengths—two dosage forms

Efudex is available as a 2% or 5% solution or as a 5% cream. It is applied twice daily by the patient with a nonmetal applicator or suitable glove.

Before prescribing Efudex, however, two important considerations: First, please consult the complete prescribing information for precautions, warnings and adverse reactions. Second, advise the patient that treated lesions should respond with the characteristic but transient inflammation. A positive sign that Efudex is working for them.

*Data on file, Hoffmann - La Roche Inc., Nutley, New Jersey.

Before prescribing, please consult complete product information, a summary of which follows:

Indications: Multiple actinic or solar keratoses.

Contraindications: Patients with known hypersensitivity to any of its components.

Warnings: If occlusive dressing used may increase inflammatory reactions in adjacent normal skin. Avoid prolonged exposure to ultraviolet rays. Safe use in pregnancy not established.

Precautions: If applied with fingers, wash hands immediately. Apply with care near eyes, nose and mouth. Lesions failing to respond or recurring should be biopsied.

Adverse Reactions: Local—pain, pruritus, hyperpigmentation and burning at application site most frequent; also dermatitis, scarring, soreness and tenderness. Also reported—insomnia, stomatitis, suppuration, scaling, swelling, irritability, medicinal taste, photosensitivity, lacrimation, leukocytosis, thrombocytopenia, toxic granulation and eosinophilia.

Dosage and Administration: Apply sufficient quantity to cover lesion twice daily with nonmetal applicator or suitable glove. Usual duration of therapy is 2 to 4 weeks.

How Supplied: Efudex Solution, 10-ml drop dispensers—containing 2% or 5% fluorouracil on a weight/weight basis, compounded with propylene glycol, tris(hydroxymethyl)-aminomethane, hydroxypropyl cellulose, parabens (methyl and propyl) and disodium edetate.

Efudex Cream, 25-Gm tubes—containing 5% fluorouracil in a vanishing-cream base consisting of white petrolatum, stearyl alcohol, propylene glycol, polysorbate 60 and parabens (methyl and propyl).



new
Efudex®
(fluorouracil)
cream/solution

DRUG ABUSE

TREATMENT SEMINAR

Four seminars on the diagnosis and treatment of the drug intoxicated patient have been scheduled by the OSMA Drug Abuse Committee.

The seminars are located throughout the state so that as many physicians as possible may be able to attend. Each is an evening meeting with dinner being served and followed by the scientific program. A registration fee of $10 per person covers the cost of the meal and meeting expenses.

All physicians should plan to attend the seminar in their area.

March 11th—Camelot Inn, Tulsa

April 8th—Altus *

May 13th—Lake Texhoma Area*

June 10th—Oklahoma City *

*Exact location of seminar will be announced later.

Brief Summary of Prescribing Information—9-9/22/69. For complete information consult Official Package Circular.
Indications: Essential hypertension. Use cautiously in patients with renal insufficiency, particularly if they are digitalized.
Contraindications: Anuria, oliguria, active peptic ulceration, ulcerative colitis, severe depression or hypersensitivity to its components contraindicates the use of Salutensin.
Warnings: Small-bowel lesions (obstruction, hemorrhage, perforation and death) have occurred during therapy with enteric-coated formulations containing potassium, with or without thiazides. Such potassium formulations should be used with Salutensin only when indicated and should be discontinued immediately if abdominal pain, distension, nausea, vomiting or gastrointestinal bleeding occurs. Use cautiously, and only when deemed essential, in fertile, pregnant or lactating patients. *Use in Pregnancy:* Thiazides cross the placenta and can cause fetal or neonatal hyperbilirubinemia, thrombocytopenia, altered carbohydrate metabolism and possibly electrolyte disturbances. Fatal reactions may occur with reserpine during electroshock therapy; discontinue Salutensin 2 weeks before such therapy. Increased respiratory secretions, nasal congestion, cyanosis and anorexia may occur in infants born to reserpine-treated mothers.
Precautions: Azotemia, hypochloremia, hyponatremia, hypochloremic alkalosis and hypokaliemia (especially with hepatic cirrhosis and corticosteroid therapy) may occur, particularly with pre-existing vomiting and diarrhea. Potassium loss or protoveratrine A may cause digitalis intoxication. *Potassium loss responds to potassium-rich foods, potassium chloride or, if necessary, discontinuation of therapy. Stop therapy if protoveratrine A induces digitalis intoxication.* Serum ammonia elevation may precipitate coma in precomatose hepatic cirrhotics. Discontinue therapy 2 weeks before surgery or if myocardial irritability, progressive azotemia or severe depression occur. Exercise caution in patients with chronic uremia, angina pectoris, coronary thrombosis or extensive cerebral vascular disease *or bronchial asthma* and in those with a history of peptic ulceration or bronchial asthma; in post-sympathectomy patients; in patients on quinidine; and in patients with gallstones, in whom biliary colic may occur. Patients who have diabetes mellitus or who are suspected of being prediabetic should be kept under close observation if treated with this agent.
Adverse Reactions: Hydroflumethiazide: Skin rashes (including exfoliative dermatitis), skin photosensitivity, urticaria, necrotizing angiitis, xanthopsia, granulocytopenia, aplastic anemia, orthostatic hypotension (potentiated with alcohol, barbiturates or narcotics), allergic glomerulonephritis, acute pancreatitis, liver involvement (intrahepatic cholestatic jaundice), purpura plus or minus thrombocytopenia, hyperuricemia, hyperglycemia, glycosuria, malaise, weakness, dizziness, fatigue, paresthesias, muscle cramps, skin rash, epigastric distress, vomiting, diarrhea and constipation. *Reserpine:* Depression, peptic ulceration, diarrhea, Parkinsonism, nasal stuffiness, dryness of the mouth, weight gain, impotence or decreased libido, conjunctival injection, dull sensorium, deafness, glaucoma, uveitis, optic atrophy, and, with overdosage, agitation, insomnia and nightmares. *Protoveratrine A:* Nausea, vomiting, cardiac arrhythmia, prostration, blurring vision, mental confusion, excessive hypotension and bradycardia. (Treat bradycardia with atropine and hypotension with vasopressors.)
Usual Dose: 1 tablet b.i.d.
Supplied: Bottles of 60, 600, and 1000 scored 50 mg. tablets.

Salutensin®
hydroflumethiazide, 50 mg./reserpine, 0.125 mg. protoveratrine A, 0.2 mg.

BRISTOL
BRISTOL LABORATORIES
Division of Bristol-Myers Company
Syracuse, New York 13201

The antihypertensive therapy that is easy to live with.*

When successive blood pressure readings confirm essential hypertension, consider Salutensin for:

Easy-to-live-with control. Gradual reduction of blood pressure leading to decisive, comfortable control is the common clinical response.

*Salutensin is usually well-tolerated (however, serious side effects can occur; see adjacent column for brief summary of prescribing information).

Easy-to-live with dosage. Two tablets a day usually achieves control. One to two tablets a day often maintains control without need for additional antihypertensive agents.

Easy-to-live with cost of therapy. The one to two tablets a day maintenance dose makes Salutensin economical to stay with. Important, because long-term control calls for long-term therapy.

Salutensin®

hydroflumethiazide, 50 mg./reserpine, 0.125 mg. protoveratrine A, 0.2 mg.



STANDARD CLAIM FORM

APPROVED BY THE OKLAHOMA STATE MEDICAL ASSOCIATION AND THE ASSOCIATION OF HEALTH AND ACCIDENT INSURORS OF

INSURANCE COMPANY | ADDRESS

TO:

ATTENDING PHYSICIAN'S REPORT

1 PATIENT'S NAME | 2 ADDRESS

4 DIAGNOSIS (EXPLAIN COMPLICATIONS)

5 ADDITIONAL DIAGNOSES (CHRONIC DISEASE OF DEFECT FOUND DURING PRE

6 DATE OF ONSET | 7 DATE FIRST CONSULTED | 8 DUE TO PREGNANCY ☐ YES ☐

11 SURGICAL OR OBSTETRICAL PROCEDURES (DESCRIBE)

12 IF HOSPITALIZED, NAME AND ADDRESS OF

15 NAME AND ADDRESS OF OTHER P

COMPLETE IF PATIEN

16 TOTAL DISAP

FROM

17. P

STANDARD INSURANCE REPORTING FORMS For Oklahoma Physicians

PLEASE ATTACH TO COMPLETED INSURANCE CLAIM FORM

STATEMENT FOR PROFESSIONAL SERVICES RENDERED

APPROVED BY THE OKLAHOMA STATE MEDICAL ASSOCIATION

PHYSICIAN S NAME | PATIENT'S NAME

ADDRESS

COMPLETE FOR MEDICAL CARE ONLY: AT HOSPITAL, HOME, OR OFFICE
GIVE THE DATES OF TREATMENT BY INSERTING MONTH AND YEAR. INDICATE EACH
H—HOSPITAL V—HOME O—OFFICE OR CLINIC

MONTH AND YEAR	1	2	3	4	5	6	7	8	9	10	11	12

PLEASE STATE YO

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★

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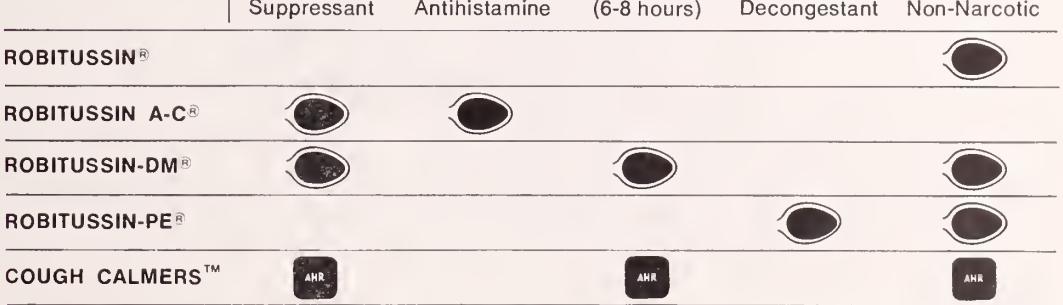
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What Is the Place of Tonsillectomy and Adenoidectomy?

RECENTLY an attractive four-year-old boy, J.H., was admitted to the Children's Memorial Hospital, University of Oklahoma Medical Center, with the following story: Approximately three weeks previously, his seven-year-old sister was taken to the family physician because of a sore throat. She had always enjoyed good health and had not suffered from recurrent sore throats or otitis media. The physician advised that as soon as the infection subsided, she should undergo a tonsillo-adenoidectomy (T. and A.). It was suggested that our patient, the four-year-old brother, should also have his tonsils and adenoids removed at the same time "because it would be convenient to do at the same time and thus, would be out of the way."

Three days before the admission of our patient, he and his sister were both taken to a hospital early on the morning of the day the operative procedure was scheduled. It was decided that J.H., our patient, would have his operation first. After one tonsil had been removed, he suddenly had a cardiac arrest and progressed to complete coma. Immediately he was rushed to the Children's Memorial Hospital where he was found to be completely unresponsive except for primitive cardiac and respiratory functions. In two days, he did not regain consciousness and there was no improvement in the other signs resulting from severe cerebral anoxia. He expired two days later, the victim of a "simple, minor operation" performed for "convenience."

The only bright spot in this tragedy is that the tonsillectomy and adenoidectomy was cancelled on J.H.'s sibling, his seven-year-old sister, in whom historically there was little or no indication for the procedure.

I must admit that there are few things which make me more indignant than to read in the newspaper that three, four, five or even more children have all been hospitalized at the same time for tonsil and adenoid removal. It is difficult, if not impossible, to believe that three or more children in the same family could have valid indications simultaneously for the removal of tonsils and adenoids.

This tragic case, which unfortunately occurs far more commonly than it should, is cited not to condemn tonsillectomy and adenoidectomy *per se*, but to condemn the performance of such procedure without indication. In this issue, Snow,[1] in his article entitled "Current Status of the Tonsil and Adenoid Problem," has provided a very logical review of the indications for removal of the tonsils and/or adenoids. All physicians concerned with children and with T. and A. surgery will benefit from review of his article.

The term "tonsils" is used in its commonly accepted sense of indicating the two faucial tonsils; the term "adenoids," as synonymous with hypertrophied pharyngeal tonsil. The tonsils and adenoids are part of the lymphoid tissues which circle the

pharynx and are known collectively as Waldeyer's Ring. This consists of the lymphoid tissue on the base of the tongue (lingual tonsil), the two faucial tonsils, the adenoids (pharyngeal tonsil) and the lymphoid tissue on the posterior pharyngeal wall. This tissue serves as a natural defense against infection; when its defense mechanism is overcome, it may become the site of acute or chronic infection.

Since first described by Celsus[2] in the first century, removal of the pharyngeal tonsils is an operation that has survived for 2,500 years. The Asiatic Indians, who were skilled in medicine 1,000 years B.C. or 460 years before Hippocrates, frequently removed tonsillar tissue.[3] Along with another ritualistic procedure, circumcision, tonsillectomy and adenoidectomy are the most commonly performed operations in our society, particularly in the very young.

A distinction can be made between socially ordained procedures in which the subject is a more or less willing participant and those in which he is clearly reluctant or has no say in the matter. Infants and children cannot be considered willing participants in procedures performed on their bodies, no matter what mystical or social roles may be involved. Many ritualistic procedures are performed on the very young.[4]

The principal disturbances of the tonsils and adenoids are infection and hypertrophy. The latter is in most instances secondary to infection. Though both tonsils and adenoids are usually removed at the same operation, there are good reasons for making the decisions for tonsillectomy and adenoidectomy separately, especially in children under four or five years of age.

Although there are certain generally accepted indications for removal of the tonsils (with or without adenoids) as Snow[1] has outlined, the survey by Bakwin[5] showed that the procedure is most often performed for enlarged tonsils and adenoids, frequent respiratory infections and parental demand.

More than two million tonsillectomies and adenoidectomies are performed each year in this country.[6] The death rate is about one per 1,000 patients operated on each year. Serious complications and sequelae occur in 15.6 per 1,000 cases each year. These include deaths from anesthesia, post-operative hemorrhage and sudden post-operative deaths, and the morbidity associated with aspiration pneumonia, lung abscess and bronchiectasis.[7] Important also are the acute and chronic effects on emotional development and personality. The literature is replete with evidence that tonsillectomy in childhood often has profound, life-long and irreversible repercussions.[4, 8, 9] At a cost of well over $150 million per year, plus the expenditure of health manpower, it is clearly a procedure that deserves close scrutiny.[10]

In his article, Snow[1] has discussed the generally accepted recommendations for tonsillectomy and adenoidectomy. I would like to comment on the reasons *why the procedure is most often performed.*

In the survey by Bakwin,[5] tonsillectomy and adenoidectomy was performed most often for three reasons: enlarged tonsils and adenoids, frequent respiratory infections and parental demand. Snow[1] has pointed out that the normal pattern of growth and development of lymphoid tissue in children must be kept in mind when assessing the need for removal of the tonsils and adenoids. Thus, during the child's early school years, when most tonsillectomies and adenoidectomies are performed, the tonsils and adenoids appear enlarged because lymphoid hyperplasia is physiologic during these years. As a matter of fact, the absence of "enlarged" tonsils and adenoids in this age group is so unusual that it may suggest the presence of an immune deficiency disorder. Most tonsils considered to be hypertrophic actually are normal in size; the misinterpretation results from failure to appreciate that tonsils are normally larger during childhood than in later years. Tonsils may, however, virtually meet in the midline in some children who are quite asymptomatic. Tonsils of average size are projected toward the midline when the child is gagged and may be interpreted by the physician who is unaware of the relatively large size of the tonsil during childhood as being hypertrophied. On the other hand, infection does not always cause hypertrophy

and chronically infected tonsils may be small and embedded behind the faucial pillars. In the evaluation of chronic tonsillar infection, a history of repeated or essentially constant sore throat is of more value than examination.

Although the relationship and the role of tonsillar tissue in immunity has not been entirely clarified, as Snow[1] points out, there is an impressive body of evidence to suggest that tonsillar tissue plays an important role in host defenses. Concurrent or very recent tonsillectomy predisposes to bulbar poliomyelitis and even remote tonsillectomy has a similar but less marked effect. The late President Franklin Delano Roosevelt underwent a tonsillectomy at age 37 years. Less than 21 months later, he was afflicted with poliomyelitis. One can only speculate about the possible cause-and-effect relationship and what influence his operation may have had on affairs of this country and for that matter the world.[11] Ogra[12] has shown recently that, following immunization with live poliovaccine, the antibody response to poliovirus in the nasopharyngeal mucosa was two to four-fold higher in children with intact tonsils than in those whose tonsils had been removed. Poskanzer[13] has reported a significant correlation between the occurrence of multiple sclerosis and previous removal of tonsils and adenoids. Robert Good[14] has stated "We still do not understand the role in the body economy but we believe the tonsils are a major factor in early defense functioning as peripheral lymphoid organs in antibody synthesis." If tonsillar or other lymphoid tissue is removed after the newborn period, immunologic defects may not become apparent for a relatively long period of time.[15]

As previously pointed out, frequent respiratory infections represent one of the most frequently stated reasons for performance of T. and A. McCorkle and colleagues[16] studied the occurrence and severity of common non-specific infections of the upper respiratory tract in a large group of tonsillectomized and non-tonsillectomized children. An important feature of this study was the adjustment of the data according to the varying incidence of infection with age and season. They found that the attack rate in tonsillectomized children was similar to that of children of comparable age who were not operated. Also there was no evidence of a difference in type of respiratory infection between the two groups. Paton[17] came to the same conclusion in an English study.

McKee[18] studied 413 children between the ages of two and fifteen years referred for surgery because of repeated respiratory infections, cervical adenitis, otitis media, allergy and chronic cough. In about half this population selected at random, the operation was deferred to two years. The controls and the patients operated on were followed for two years. This study indicated 1.96 episodes of sore throat per child per year in the control subjects and 0.39 episodes per year per child in tonsillectomized subjects. North,[19] after analyzing the results of this study, stated "The benefits reported by McKee (taken at face value and not discounted for placebo effect) give each tonsillectomized child 1.6 fewer total illnesses, 3.4 fewer days in bed, 5.8 fewer days lost from school, 1.2 fewer physician visits, 0.16 fewer episodes of otitis and 1.56 fewer sore throats. The costs of these benefits include approximately $200 in hospital and physician fees, a risk of death of one to three per 10,000, approximately three days in bed for the operation, approximately five days lost from school because of the operation, at least one severe sore throat associated with the operation, and 0.19 operative complications including 0.035 episodes with otitis."

Tonsillectomy was at one time almost a routine procedure in patients with rheumatic fever. The studies of Quinn, Denny and Riley[20] as well as others have shown that the presence or absence of tonsils does not affect the hemolytic streptococci carrier rate. Snow[1] has emphasized that the indications for tonsillectomy and adenoidectomy in children with histories of rheumatic fever or glomerulonephritis are the same as for other children.

In another study, McKee[21] showed that adenoidectomy alone caused the same reduction in otitis media as the combined procedure and concluded that adenoidectomy was the operation of choice for recurrent otitis media. Mawson, *et al.*[22] in a similarly

designed study of 404 children found that the incidence of otitis media was not affected by tonsillectomy and adenoidectomy, although the frequency of infection of the upper respiratory tract and sore throat was reduced in only the first post-operative year. The improvement could conceivably be due to *an* operation rather than *the* operation.[6] Comparatively few children who undergo an adenoidectomy alone subsequently develop an indication for tonsillectomy.[1]

Evans,[23] after recently reviewing the body of controlled statistical data, concludes that there is no compelling evidence of any long-term benefit from tonsillectomy and adenoidectomy. He states that some short-term benefits may be derived in children four to six years of age with severe recurrent tonsillitis. Also, adenoidectomy alone occasionally improves severe recurrent otitis media. Haggerty,[10] after evaluating many of the same data, believes that the combined operation should be sharply limited before the age of four years and performed only for a severe and persistent nasal or pharyngeal obstruction or for recurrent bacterial tonsillitis. For recurrent otitis media he advocates medical management first and, if these measures prove unsuccessful, the performance of adenoidectomy alone. Under these conditions, no more than two or three percent of the entire pediatric population should require T. and A. Yet, despite its meager scientific justification and a growing critical attitude about its indications by many pediatricians and otolaryngologists, approximately 20 to 30 percent of the children in most communities still undergo this procedure.[4]

The third major reason why tonsillectomy and adenoidectomy is done relates to parental pressure to perform the operation. The willingness of physicians to comply with parental demand has institutionalized and, indeed, ritualized the operation to a considerable extent. Furman[19] states that parental attitudes, at least on the conscious level, are based mainly on two misconceptions: That the only function of the tonsil is to be removed surgically and that all respiratory illnesses, in particular sore throats, are equated with tonsillitis. Blame for any illness can be shifted conveniently to the tonsils. It should be noted that tonsillectomy tends to be performed much more often in the children of wealthy parents who are in the professional and managerial classes.[7] Furthermore, circumcised boys are seven times more likely to have undergone tonsillectomy in early childhood than uncircumcised boys.[25] This suggests that those families partaking of one ritual involving their children may be more apt to indulge in another.[4] As Ferguson[26] states, "When a responsible physician maintains that even today most tonsils and adenoids are primarily removed because of parental pressure, simple enlargement, or mere recurrent upper respiratory infections, the time has come to ask him to define the *raison d'etre* of a medical advisor."

Decisions to remove tonsils should be based so far as possible on symptoms and signs related to the tonsils as Snow[1] has emphasized. Tonsillectomy should not be recommended as a panacea for unrelated disturbances. No systemic disturbance in itself is an indication for tonsillectomy and the decision should be based purely on local indications. The tonsils and or adenoids should not be removed in a blind search for a focus of infection or as a remedy for undernutrition. It seems clear that T. and A. is often performed without clear indication, frequently for fulfillment of parental need. The performance of tonsillectomy and adenoidectomy on subjects under the age of five years should be sharply limited because of the emotional vulnerability of the child during this period of development. The indications at any age should probably be restricted to recurrent tonsillitis, peritonsillar abscess, recurrent otitis media, and severe airway obstruction and adenoidectomy alone is probably sufficient for the latter two conditions.[4] Above all the physician should recall the tenet "*primum non nocere*" in consideration of this question. *Harris D. Riley, Jr., M.D.* □

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"We could make our lives sublime."

Another verse . . . but what could benefit us more than aside from our routine duties we might keep a wary eye peeled for a prospective physician among our practice. Many well-motivated, eager young men pass up the chance to study medicine because of the lack of encouragement and guidance. Who could better evaluate a prospective physician than we who have an opportunity to observe so closely these young people. Might we not improve our minds and be intellectually more alert by sitting on a medical school admissions board one night a week during these most important deliberations, than pursuing a selfish recreation.

We are so busy we haven't time to help solve hospital efficiency problems, but then again, who could make better judgement decisions than the men who daily spend much time within these confines? In this most important phase of patient care once again we abrogate our responsibilities to those less capable only to stand by in shocked silence when some decision unfavorable to our profession is rendered by nonprofessionals.

"And departing leave behind us footprints on the sands of time."

Though most of us will not achieve such a lofty goal as described above, all are capable of some contribution. In an era when practicing physicians are so desperately needed, let us be aware of our capabilities of passing on to young physicians our experience, and to take every opportunity to enlarge our sphere of medical influence. □

Sincerely yours,

E. L. Calhoon M.D.

OSMA JOURNAL/scientific

Current Status of the Tonsil and Adenoid Problem

JAMES B. SNOW, JR., M.D.

The judgment as to whether a tonsillectomy and adenoidectomy should be performed rests on whether the chance of relief of a specific symptom or complication of lymphoid infection or hyperplasia merits the risks of the known operative morbidity and mortality.

TONSILLECTOMY and adenoidectomy remain the most frequently performed operative procedures in the United States. Over 2,000,000 tonsillectomies and adenoidectomies are performed each year in this country.[1] The mortality from these procedures is around 300 per year or 0.015 percent. Some estimate that in affluent communities one-third of the children have had tonsillectomy and adenoidectomy by the age of 12 years. It is difficult to justify the frequency with which these operations are performed on the basis of current indications. There are valid indications for these procedures; however, the use of these operations on this scale requires careful scrutiny.

From the Department of Otorhinolaryngology, University of Oklahoma Medical Center, Oklahoma City.

There continues to be widespread lay and professional misunderstanding of the role of these procedures. Generalizations about their effectiveness are largely a matter of clinical impression and are not substantiated by critical analysis of the results of valid studies. In all fairness, the problem is exceedingly difficult to study in an objective manner.

Most frequently these operations are performed to relieve conditions produced by lymphoid hyperplasia. These procedures are thought of as an attempt to restore normal physiology in the upper respiratory tract when medical management has failed. Differentiation between normal or physiologic lymphoid hyperphasia and pathologic lymphoid hyperplasia is often difficult. Since both may cause otitic or even cardiac complications, the question is often meaningless. Nevertheless, knowledge of the normal lymphoid hyperplasia that occurs in the process of growth and development must be taken into consideration in the evaluation of the symptoms and complications of tonsillar and adenoidal hyperplasia in an individual patient. The rate of increase of lymphoid tissue is relatively rapid throghout the first decade so that by ten years of age there is nearly twice as much lymphoid tissue including the tonsils and adenoids as will be present at maturity. A childhood excess of lymphoid tissue, as judged by adult standards, may be considered physiologic rather than

pathologic and may be expected to disappear in connection with normal developmental changes during the second decade. This unique pattern of change exhibited by lymphoid tissue must be kept in mind when assessing the tonsils and adenoids. In an individual patient, age plays a decisive role. A 12 or 13-year-old child with nasal obstruction on the basis of adenoid hyperplasia has a favorable outlook with conservative management. On the other hand, a six-year-old child with the same problem is likely to have six to eight years before normal lymphoid involution can play a beneficial role. The mid-teenager or young adult with sufficient adenoid hyperplasia to produce nasal obstruction, though an unusual problem requiring careful evaluation, is not likely to be benefited from watchful waiting.

The physiologic changes in lymphoid tissue due to growth and development are only one form of hyperplasia that is encountered. It is a general phenomenon affecting lymphoid structures throughout the body and is not necessarily related to upper respiratory allergy and infection.

The cause of lymphoid hyperplasia that is most difficult to recognize for what it is is the lymphoid hyperplasia that occurs as a response to allergic reactions. Generally this form of lymphoid hyperplasia tends to be handled surgically without initial appreciation of its etiologic basis. There are sufficient reasons for this state of affairs. It is often difficult to differentiate the role of physiologic hyperplasia of growth and development and the hyperplasia of infection from the hyperplasia of allergic reactions. It is often difficult to evaluate the efficacy of allergic management until the hyperplastic adenoids have been removed. Nevertheless, one becomes painfully aware of the failure of adenoidectomy to solve a problem such as serous otitis media in the child whose basic problem is an upper respiratory allergy.

The major cause of pathologic tonsillar and adenoidal hyperplasia is infection. Bacterial infection such as streptococcal pharyngitis and tonsillitis produces transient tonsillar and adenoidal hypertrophy. On the other hand, viral infection produces prolonged periods of lymphoid hyperplasia lasting three or more months.[2] In particular, the adenoviruses appear to be the worst offenders in this situation. It is of particular interest that adenoviruses have been isolated from 62 percent of adenoids which have been removed surgically.[3] Adenovirus Types 1, 2, 3 and 5 may remain in the tonsils and adenoids as latent agents for long periods. Many children who have sufficient symptoms and complications of lymphoid hyperplasia in the upper respiratory tract to require a tonsillectomy and adenoidectomy go from one viral infection to another over a period of months and thereby remain in a state of perpetual lymphoid hyperplasia. It is of interest to speculate as to how frequently these operative procedures would be required if an effective control of upper respiratory viral infections were available.

INDICATIONS FOR REMOVAL OF THE TONSILS AND ADENOIDS

The indications for the removal of the tonsils and adenoids continue to be a subject of debate. In operative procedures in which there is risk of mortality and morbidity, considerable care must be exercised in the recommendation of these procedures in an individual patient.

In current practice the most common indication for these procedures is serous otitis media. A sterile effusion in the middle ear space lasting six weeks or longer either occurring *de novo* or following acute otitis media in a child that does not respond to medical management responds regularly but not invariably to adenoidectomy. The use of myringotomies with the insertion of tympanostomy tubes at the same anesthesia increases the percentage of successful results.

Chronic otitis media in children represents another common indication for the procedure. The rationale for the procedure is to reduce the severity and frequency of exacerbations of the chronic otitis media with upper respiratory infections. It prepares the patient for subsequent mastoidectomy and tympanoplasty in the hope of

maintaining the best possible result.

These otitic conditions are indications mainly for adenoidectomy. Frequently an adenoidectomy alone is indicated and there is no need for tonsillectomy.

All other indications for these procedures are much less frequently justified. However, in an individual patient, any one of the indications discussed below may be just as pressing and just as valid as the two already mentioned.

Recurrent acute bacterial tonsillitis due to Group A Streptococcus occurring three to four times during a year in children from two to seven years of age can be adequately managed with antibiotics such as penicillin or other appropriate antibiotics when given for a 12-day course of therapy. The rationale for this length of treatment is that a shorter period may not eliminate a streptococcal infection. Rapidly recurring tonsillitis after brief courses of antibiotic therapy does not have the same significance in terms of an indication for tonsillectomy as rapid recurrence after adequate treatment. Such rapid recurrence of tonsillitis after brief courses of antibiotic therapy is to be expected and may have considerable significance in terms of the development of rheumatic fever and glomerulonephritis. Aside from inappropriate selection of antibiotics and inadequate duration of treatment, the other major problem that must be considered in recurrent streptococcal tonsillitis is whether the streptococcus is being passed back and forth among family members. This problem requires simultaneous culture of the whole family and simultaneous treatment of all carriers. Nevertheless, there are a number of children who develop tonsillitis within a few days after the completion of adequately long treatment with an appropriate antibiotic. When this pattern can not be altered medically, tonsillectomy and adenoidectomy are indicated. Likewise, adolescents and adults who fall into this pattern require tonsillectomy.

Chronic tonsillitis with persistent sore throat, either briefly relieved or not at all relieved by antibiotic therapy, still constitutes a frequent indication for tonsillectomy. Likewise, one peritonsillar abscess is an indication for tonsillectomy. The problem in peritonsillar abscess is the likelihood of recurrent peritonsillar abscesses. The explanation for this propensity of peritonsillar abscesses to recur is often apparent at surgery six weeks after the abscess has resolved clinically when one finds a milliliter or more of pus between the tonsillar capsule and the superior constrictor of the pharynx. Fortunately, peritonsillar abscesses are rarely encountered in children under the age of ten.

Recurrent acute otitis media is a fairly frequent indication for these procedures. However, many children between one and six years of age, who have two or three episodes of acute otitis media per year which completely resolve with antibiotic therapy and if necessary myringotomy, do not need a tonsillectomy and adenoidectomy. On the other hand, the child who is on antibiotic therapy for otitis media half of the time should be considered for these procedures. The duration of pain, the presence of spontaneous perforation of the tympanic membrane, the regularity with which myringotomy is required, the associated systemic symptoms all deserve consideration in the evaluation of this indication for these procedures. Febrile convulsion with either otitis media or tonsillitis weigh heavily in favor of these operations since antibiotic therapy ordinarily is not initiated prior to the convulsion.

Persistent nasal obstruction due to adenoidal hyperplasia as already indicated is a problem in which the age of the patient as well as the severity of the problem must be considered. Persistent and recurrent purulent rhinorrhea in spite of adequate antibiotic therapy is occasionally encountered on the basis of adenoidal hyperplasia

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and chronic adenoiditis. True sinusitis in children without an underlying immunologic or other defense mechanism defect is relatively rare but is rather regularly improved or eliminated by adenoidectomy.

Tuberculous cervical lymphadenitis is no longer considered an indication for tonsillectomy in view of the fact that it is generally agreed that most often this process results from hematogenous spread from a pulmonary infection.[4] Although tuberculous tonsillitis and lymphadenitis are occasionally observed simultaneously in adults, the treatment of choice in this situation is chemotherapy.

A history of rheumatic fever or glomerulonephritis does not represent an indication for these procedures since tonsillectomy and adenoidectomy do not affect the recurrence rate of either of them. Interestingly though, Matanoski, *et al.*[5] found that streptococcal infection and isolation rates were significantly lower in an individual who had had a tonsillectomy. Generally the same indications hold for children with a history of rheumatic fever and glomerulonephritis as hold for other children. Children with the nephrotic syndrome who have an exacerbation of albuminuria with tonsillitis or otitis media deserve careful consideration for these procedures.

A most rewarding indication for these procedures has come to light in recent years for the child with sufficient lymphoid hyperplasia to result in alveolar hypoventilation.[6] In children with alveolar hypoventilation on the basis of upper respiratory lymphoid hyperplasia resulting in carbon dioxide retention and subsequent pulmonary hypertension, the cor pulmonale is dramatically reversed by tonsillectomy and adenoidectomy.

A debatable indication for these procedures is tongue thrusting or reverse swallowing. Ricketts[7, 8] makes a strong case from the orthodontic point of view that all stubborn tongue thrusting is on the basis of upper respiratory obstruction. More must be learned about the basic problem of tongue thrusting before definite conclusions about its management can be stated.

The question of the value of these procedures in allergic children continues to be debated. The fear of the development of asthma in allergic children after a tonsillectomy and adenoidectomy is probably not valid. The same indications for these procedures apply to allergic children as to nonallergic children. By analogy to the alveolar hypoventilation leading to respiratory acidosis produced by upper respiratory lymphoid hyperplasia, an interesting concept has evolved; that is, nocturnal asthma may be produced by respiratory acidosis. Respiratory acidosis is known to produce an epinephrine fast state in asthmatics. Correction of this state requires intravenous bicarbonate solutions before the bronchospasm can be relieved. Whether upper respiratory tract lymphoid hyperplasia is related to the initiation of the nocturnal asthmatic attack remains an interesting conjecture.

Currently much is made of the importance of hyperthermia of 104° F. or greater in relationship to acute tonsillitis and some advocate including the consideration of how high the temperature goes as an indication for these procedures. The thesis is that more harm results from hyperthermia in childhood than we have been accustomed to believe. Fevers of 103° to 105° are usual with acute tonsillitis. Until more is known about the deleterious effects of temporarily interrupting aerobic metabolism at these temperatures, this indication should be viewed with caution.

McKee[9] made an interesting study of the effects of tonsillectomy and adenoidectomy in children. He excluded from his study all children with the indications of peritonsillar abscess, pyrexial tonsillitis accompanied by convulsions or exacerbations of renal or rheumatic disease, frequent or severe tonsillitis over a period of several years despite continuous antibiotic therapy, deafness, recurrent or chronic otitis media and proven sinusitis. He selected patients with three or more isolated throat infections with cervical adenitis within the previous 12 months and carried out random selection for tonsillectomy or observation. Surprisingly, the op-

eration seemed to be beneficial in reducing upper respiratory infections in children under five years of age. No benefit was found in children over eight years of age. The severity of the problem in his study group would not in my opinion justify the risk of the procedure. In a child in which adenoidectomy is indicated and the tonsils are left, what are the chances that a tonsillectomy will subsequently be indicated? Young[10] found in six to nine year follow-up, one in eight subsequently developed indications for tonsillectomy. Of those children who had the adenoidectomy after six years of age, only one in 20 developed an indication for tonsillectomy.[10] It appears that if an adenoidectomy alone is likely to solve the otitis problem, the tonsils may be left with acceptable probability that a second procedure will not be required.

One of the more interesting questions regarding tonsillectomy and adenoidectomy has unfolded with the recent advances in the knowledge of the ontogeny of immunity. In the study of the avian lymphoid system, two separate cells systems having distinct morphology and function emerged. The thymus was shown to be necessary for the development and function of a population of lymphoid cells, mainly small lymphocytes, in peripheral lymphoid tissues. As in mammals, the avian thymus system of cells affects delayed allergic reactions, graft versus host reactivity, and at least the major portion of homograft rejection. These immunologic functions are collectively termed cellular immunity. On the other hand, plasma cell and germinal center development was demonstrated to be dependent on the intestinal bursa of Fabricius. The bursal system of cells is responsible for the synthesis of immunoglobulins or circulating antibodies. Removal of the bursa of Fabricius in newly hatched chicks prevents development of normal antibody producing capability. The lymphoid cells in the bursa of Fabricius are small lymphocytes related intimately to gut epithelium. The question arose as to what mammalian tissue is equivalent to the avian bursa of Fabricius. What lymphoid tissue has germinal center lymphoid structure, is associated with gut epithelium, exhibits maximal growth in early life, and shows involution later in life following sexual maturation? Cooper, *et al.*[11] considered the palatine tonsils to be a likely candidate for the bursal role. However, they have been unable to demonstrate an effect on antibody-synthesizing capacity in rabbits after neonatal tonsillectomy even in combination with total body irradiation. On further study of this problem, they found that removal of intestinal lymphoepithelial structures in rabbits analagous to Peyer's patches in man resulted in effects on immunologic development consistent with bursectomy in birds.

Other studies of the immunologic importance of the tonsils and adenoids have not been particularly illuminating. The human immunoglobulins have been recently summarized by Waldman.[12] In studies of immunoglobulins in the tonsils, Kawarada[13] found only IgA and no IgM or IgG. Likewise, Rossen[14] has demonstrated IgA in the tonsils but has found similar amounts of IgA in the cells of many tissues lining the oral and respiratory passages. On the basis of the current immunologic evidence removal of the tonsils and adenoids does not appear to be deleterious from an immunologic point of view.

It is apparent that no attempt has been made to discuss the very important subject of the specific contraindications to these procedures such as bleeding tendencies, blood dyscrasias, etc.

SUMMARY

The main question regarding the decision as to whether the tonsils and adenoids should be removed is unchanged from past years. The main question in an individual patient assuming there is no specific contraindication relates to the judgment of whether the relief of a specific symptom or complication of lymphoid hyperplasia or the relief of recurrent or persistent infection merits the risks of the known operative morbidity and mortality of these procedures. □

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Carcinoma of the Prostate in Private Practice

DONALD D. ALBERS, M.D.
OBIE L. STALCUP, JR., M.D.

Contrary to general clinical impression, adenocarcinoma of the prostate is a bad disease. A five-year follow-up on 100 private cases revealed an overall 40 percent five-year survival and improved survival depends on earlier diagnosis and a more aggressive approach than has been generally believed in the past.

THIS STUDY was prompted by some of our colleagues in Internal Medicine who expressed the opinion that they had rarely seen anyone die of cancer of the prostate. We have seen only a few patients die of this malignancy and for these reasons began to wonder what had happened to our private patients.

Since many patients seem to do very well, we had developed the impression that private patients fared better than institutional patients especially the Veterans Administration Cooperative Study Series.[1] Their overall five-year survival was about 43 percent as calculated from accumulation of all stages in the 1967 report. That report also indicated that stilbesterol, which we had been using since the early '40's, did not improve the survival of patients with cancer of the prostate but probably was deleterious because of the accompanying increase in cardiovascular disease.

This report is an attempt to appraise private patients with cancer of the prostate to find out if they, in general, do have a rather benign course and usually die of some other disease.

MATERIALS AND METHODS

The patients for this study were unselected and consecutive with the following qualifications: They were all privately cared for, the diagnosis of cancer of the prostate had to have been made at least five years previously for inclusion in this study, and there had to be 100 percent follow-up.

We relied heavily on records of the Oklahoma State Health Department. It took a few years' records to accumulate 100 cases on which we could get accurate follow-up information. No attempt was made to retrieve all cases of cancer of the prostate during the years of this study because, for the earlier years, the records were not computerized.

Comments will be made at the five-year follow-up period. Individual follow-up varies after that point, the average being about 8.3 years and reference will be made to this longer follow-up.

RESULTS

Somewhat surprisingly, the five-year survival was only 40 percent. Thirty-three percent died of cancer of the prostate and 27

From the Oklahoma City Clinic, 301 N.W. 12th, Oklahoma City, Oklahoma.

percent died of cardiovascular disease. Eleven of this latter group died very soon after the institution of estrogen therapy, which primarily was stilbesterol, five mg. daily.

The longer follow-up on these patients, up to ten years in some, brought the survival down to 21 percent. Forty-four percent died of cancer of the prostate and 35 percent died of cardiovascular disease or other causes.

Of those who died of cancer of the prostate, there were five patients who lived from seven to 11 years and seemed to tolerate their cancers well. One patient had generalized metastases when first seen yet lived six years. He had stilbesterol therapy, castration, and finally, cortisone suppression of adrenal function. Another patient had a non-functioning kidney when the diagnosis was first made. This proved to be due to obstruction of the ureteral orifice from the prostatic cancer and yet he lived ten years with prostatic resection and hormonal management.

One patient had what was thought to be a huge benign adenoma of the prostate and when enucleation was started, a prostatic cyst was evacuated and the mass disappeared. The residual prostate was small but definitely malignant as confirmed by pathologic study.



KUB showing extensive bone metastases from carcinoma of prostate at onset of therapy. The patient lived six years.

Of those patients who are still living in this series, many have low-grade malignancies but a few with high grade lesions have survived long periods. Of particular interest is that five of this group had radical prostatectomies and at least four of these appear to have been cured of malignancy. Only one is indeterminate at the moment and may be cured.

DISCUSSION

This series seems too small to warrant statistical evaluation of the results of therapy in the various stages of prostatic cancer or histological grades and no attempt was made to tabulate these features. Broder's type grading was not generally done. Practically all of these patients had hormonal therapy, except those having radical prostatectomies, so the comparative influence of estrogens really could not be assessed. It is generally accepted that the advancing stage of the cancer (from no clinical evidence to typical clinical cancer in the prostate along with generalized metastases) as well as the histological grade of the cancer have definite influence on the survival rate.

It is of current interest that the V.A. studies indicated that stilbesterol increased the incidence of cardiovascular disease to

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the degree that the benefit derived from this hormonal management is negated as far as survival rate is concerned. In the late symptomatic prostatic cancers, it seems that at least clinical benefit is derived. It was their suggestion that in patients who weren't suitable for radical surgery or total removal of the malignancy, and in whom symptoms had not developed, it would be prudent to withhold hormonal treatment until symptoms became definite. Some have found radiation therapy effective in these patients.

There is a general trend to become more aggressive about doing total prostatovesiculectomy in the care of this disease and yearly examinations of the prostate in all patients over the age of 45 is recommended. When total removal is not feasible, hormonal management is indicated when symptoms occur. It would appear that in patients with cardiovascular disease, orchiectomy would be favored over estrogen therapy. Obstructive disease such as bladder retention or obstruction of the kidneys must be managed properly when it occurs.

CONCLUSIONS

From this appraisal of private patients with cancer of the prostate, it is certain that this is a "bad" disease and the five-year survival rates are not as good as have been assumed. The best results are in patients in whom total prostatovesiculectomy can be performed and it is obvious than an attempt should be made to find lesions earlier so that more patients can be managed by this method.

Stilbesterol therapy is not a panacea and probably should be reserved for the symptomatic cases in which orchiectomy for some reason is not advisable.

This study was conducted with the assistance of Mrs. Thelma J. Kirby, Record Librarian of the Oklahoma City Clinic.

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Brief Summary

Indications

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Contraindications

Known hypersensitivity to erythromycin. I.M. preparation also contraindicated in patients hypersensitive to the "caine" type of local anesthetics.

Precautions, Side Effects

Occasionally abdominal discomfort, cramping, nausea or vomiting may occur; generally controlled by reduction of dosage. Mild allergic reactions, such as urticaria and other skin rashes, may occur. Serious allergic reactions have been extremely infrequent; if hypersensitivity is encountered consider appropriate countermeasures, e.g., epinephrine, steroids, etc., and withdraw drug. The rare possibility of overgrowth of nonsusceptible organisms should be kept in mind; if it occurs withdraw drug and institute appropriate treatment. Local venous discomfort, generally mild, may occur with I.V. administration. I.M. preparation is suitable for deep intramuscular administration only; restrict use in children with small muscle mass. A mild transient local discomfort sometimes occurs following rectal insertion of Erythrocin Suppositories; discontinue if significant discomfort persists.

Administration and Dosage

I. ORAL: In adults with mild to moderate infections caused by readily-susceptible organisms 1.0 Gm. daily; more severe infections or those caused by less susceptible organisms 2.0 Grams daily; unusually severe infections up to 4 or more Gm./day. Daily dose in children is 15 to 25 mg./lb./day depending upon severity of infection. Daily dose should be administered in divided doses at 4-to-6 hour intervals. Continue treatment for at least 48 hours after symptoms have subsided and temperature has returned to normal. In fulminating or life-threatening infections, a parenteral form of erythromycin is preferred.

II. PARENTERAL: Intravenous administration may be continuous or intermittent (6 to 8 hour intervals); 1 to 4 Gm. daily in adults; 15 to 25 mg./lb./day in children, depending upon severity of infection. Recommended I.M. dose is 100 mg. (2 ml.) for adults, 50 mg. (1 ml.) for children 30 lbs. or more and 1.4 to 1.8 mg./lb. in smaller children. Injections are usually given at 6 to 8 hour intervals; may be given at 4 to 6 hour intervals for severe infections.

III. RECTAL: Following therapeutic doses are recommended in children: to 20 lbs., 1-125 mg. suppository every 8 hours; 20 to 40 lbs., 1-125 mg. suppository every 6 hours.

Change to oral therapy as soon as practicable.

101281

Dizziness, Vertigo and Imbalance

KINSEY M. SIMONTON, M.D.

The terms dizziness, vertigo and imbalance are often used interchageably. Closely defined, they signify different symptoms which are of diagnostic significance. Detailed description of the symptom allows the physician to draw valuable conclusions for diagnosis and treatment.

DIZZINESS, vertigo, and imbalance are terms that indicate disturbed orientation in space and impaired ability to maintain balance while in an erect posture. Associated symptoms are inability to fix the vision on a single point and nausea and vomiting. These symptoms should be distinguished from ataxia, paralysis, and joint disturbances, which also cause difficulty of locomotion.

Dizziness is the term most commonly used by patients. Dizziness is defined in Webster's Collegiate Dictionary as "foolish, silly, a whirling sensation in the head with a tendency to fall, mental confusion, or giddiness." Dizziness is an inclusive term. Patients use the term in an indefinite manner to describe a wide variety of symptoms. As a result, the physician must inquire further in order to determine what the patient means. Vertigo, which refers to an hallucination of motion, is a more specific term. Most commonly, the motion is rotary, although it may be side-to-side, front-to-back, up-and-down, a sensation of falling, or a sensation of the bed or chair rocking or rolling. Imbalance is a milder disturbance than is vertigo. Imbalance refers to states of unsteadiness in the erect posture or a sense of dysequilibrium. It tends to be more constant in its degree than vertigo. The person with imbalance can walk without support but is unsteady on his feet and feels insecure. Ataxia and incoordination result from impaired muscle control and are characterized by inability to coordinate limb movements for locomotion.

Vertigo and imbalance occur primarily with changes in function of the paired labyrinths. Each movement of the head stimulates one labyrinth and suppresses the other. The combined signals give knowledge of position in space. Change, either excitation or suppression, upsets the computer and is recognized as dysequilibrium. Sudden and severe changes cause vertigo. Slowly progressive or mild changes cause imbalance. Total loss of one labyrinth causes transient vertigo when the victim is quiet. Symptoms that are present with motion lessen as the patient learns to interpret the unopposed signal from the remaining labyrinth. This adjustment is called compensation.

Mayo Clinic and Mayo Foundation: Department of Otorhinolaryngology.
Read at the meeting of the Oklahoma City Clinical Society, Oklahoma City, October 26th to 28th, 1970.

DIZZINESS

The patient who states that he is dizzy may have a true vertigo, imbalance, or ataxia. However, he may be describing symptoms of organic disease such as syncope, fatigue, or the malaise of acute infection, or functional symptoms, mental confusion, tension headache, swimming sensation in the head, or inability to concentrate. These sensations are difficult for the patient to describe accurately. In general, the organic symptoms are described in a much more consistent and organized form than are the functional symptoms. The request, "Describe the sensation which you call by the term dizzy," often suffices to clarify the meaning of the symptom. When this fails, inquiry concerning the patient's actions when the symptom is present may shed light on the nature of the symptom.

VERTIGO

The patient with true vertigo seeks support, preferably in the horizontal position. It is significant if he must have support from another person, follow the furniture or the walls, or crawl to reach the bed where he may lie down. On reaching the bed, he lies fixed in one position with his eyes closed. The severity of the vertigo lessens while the person is recumbent but is aggravated by any motion, even turning the head. The person who paces the floor, gets a cup of coffee, or goes out for a walk does not have true vertigo. When vertigo is severe, the patient is unable to maintain his balance in the erect posture. In milder states, he can walk but tends to reel or stagger drunkenly. Usually, he turns more to one side than to the other. Muscle strength is not impaired. Nausea and vomiting are prominent, as is the inability to fix the vision on any one point.

Causes of Vertigo.—Labyrinthine vertigo has several causes. The most common is motion sickness. This is variously named for sea, air, or car, according to stimulus. The disorder is due to response of an oversensitive labyrinth to continued stimulation of motion. Its cause and benign nature are generally recognized by patients and their friends and relatives so that treatment is rarely sought. In recent years, several antivertigo drugs have been available. These are effective if taken before the onset of symptoms.

Meniere's disease is an example of labyrinthine vertigo. Histologic evidence suggests that this disorder results from periodic increases in pressure of the endolymph. The cause of increased pressure is unknown, and several factors probably produce the disorder. The disorder is manifested by episodes of acute whirling vertigo which is aggravated by motion and which often prevents standing. As the episode subsides, vertigo lessens to imbalance and is present only on motion. Associated with the vertigo is nausea and vomiting and fullness, tinnitus, and disturbed hearing in one ear. The disturbed hearing is characteristic. Sounds of low intensity are not heard. Sounds intense enough to be heard are distorted. Music is dysharmonic. Loud sounds appear too loud, and speech is jumbled. Buzzing or roaring tinnitus is an annoying symptom, and fullness or pressure is felt in the affected ear. After early attacks, the symptoms subside into complete remission, which may last from days to several years. After repeated attacks, some degree of permanent hearing loss takes place. A few persons are bothered by a constant sense of instability or insecurity. A variant of the symptoms, the utricular crisis or otolith crisis, finds the patient suddenly struck by loss of muscle tone so that he falls to the floor, even when seated, and may be injured. Fortunately, this is rare.

The repeated episodes of incapacitating vertigo produce intense apprehension and may result in severe neurosis.

The medical treatment of Meniere's disease is generally unsatisfactory, a fact attested by the many treatments that have been proposed. Medical treatments in the main have been devised on an empiric basis, and judgment of effectiveness is difficult because of the spontaneous remissions. Among the treatments are several combinations of vitamins, vasodilating drugs, diuretics, including salt restriction, anti-

histamine drugs, sedatives, allergic management, and corticosteroids. The latter programs, allergy and steroids, are effective in a few patients. Among allergens, foods seem to be the primary offenders. Treatment with steroids has been of benefit in maintaining the hearing in bilateral Meniere's disease. Large doses of 40 to 60 mg of prednisone each day are given at the onset of treatment. When symptoms decrease, the dose is reduced rapidly, until it is approximately 15 mg/day. The dose is then reduced slowly, with frequent observation, until a maintenance dose is achieved. A difference of one to two mg/day may mark the borderline between relief and continued symptoms.

Surgical treatment is practical when the major symptom is incapacitating vertigo. Destruction of the labyrinth or division of the eighth cranial nerve prevents abnormal stimuli from reaching the central nervous system. Selective division of the vestibular nerves allows preservation of hearing. Various conservative surgical procedures on the labyrinth attempt to prevent endolymphatic hypertension while preserving the normal function. These have had a degree of success, although none is without hazard to hearing.

Viral labyrinthitis occurs as an episode of severe vertigo during the course of a viral infection. The disorder is self limited, and complete recovery is expected. Associated damage to the hearing is usually permanent. Arterial occlusion within the labyrinth also produces a temporary vertigo but permanent loss of hearing.

Postoperative labyrinthitis occurs after surgery for restoration of hearing. The patient should be re-examined by his ear surgeon because secondary exploration of the ear may relieve the disorder without permanent damage.

Middle-ear infections (either acute or chronic) that invade the labyrinth create active vertigo. Severe infections create permanent damage and permanent loss of function. Milder infections produce repeated episodes, which may persist until the infection is controlled by medical or surgical means.

Less frequent causes of vertigo are trauma, arteriosclerosis, migraine, brain tumor, and Cogan's syndrome.

Head injury with fracture through one or both labyrinths usually causes permanent loss of labyrinth function with transient vertigo. The vertigo may not be apparent while the patient remains in bed but appears as imbalance when he gets up. Patients compensate for the total loss of one labyrinth as they learn to interpret the unopposed signals from the remaining labyrinth. Symptoms while the patient is resting quietly in bed are minimal. Vertigo and imbalance, which are present with any movement immediately after the loss of function, gradually subside and are noted only on extreme motion after a few weeks. The compensation is accelerated by exercises that produce a sensation of vertigo.

Arteriosclerosis affecting the central nervous system produces symptoms ranging from vertigo to lightheadedness or syncope. These symptoms may or may not be associated with change of posture. Ear symptoms are not characteristic of the disorder. Transient paresthesias and paralyses are suggestive of this diagnosis.

Migraine is occasionally manifest as transient vertigo in the course of the attack.

Vertigo is rarely a symptom of brain tumor, other than of tumors that affect the eighth cranial nerve.

Cogan's syndrome, nonspecific interstitial keratitis with vestibulo-auditory symptoms, is apparently related to collagen disease. Violent vertigo results from sudden depression of labyrinth function. Early treatment with corticosteroids in large doses may pre-

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vent permanent loss of vestibular and hearing function.

Types of Vertigo.—Positional vertigo refers to a sensation of true vertigo that is present when the patient assumes a particular position. This usually is noted in bed when the patient is unable to lie on the right or the left side without vertigo. The symptom ordinarily is transient and passes away if the position is maintained for a few minutes. It may be severe and very distressing. The symptom is not associated with other ear symptoms and is considered a disorder of the labyrinthine otoliths. No treatment is known.

Benign postural vertigo refers to the faintness, light-headedness, and weakness that occur on change of posture. This commonly occurs when the person rises from his bed, stoops and rises, or looks up. The sensation persists for seconds to a few minutes and passes. This is not a true vertigo and is not labyrinthine in origin; rather, it results from a momentary delay in the adjustment of the blood circulation to the change of posture.

IMBALANCE

Imbalance is related to the vestibular system but is a much milder and less dramatic symptom than vertigo. Imbalance takes various forms. Characteristic is a sense of uncertainty and insecurity when in the erect posture and particularly when in motion. The patient is comfortable when seated or recumbent. More severe degrees, which border on vertigo, may result in a sense of motion, although with limited degrees of disability. Unlike vertigo, which is intermittent, imbalance has symptoms that tend to be continuous. Imbalance occurs in lesions of the cerebellopontine angle, cholesteatoma, neurinoma, or meningioma. Slow increase of pressure on the fibers of the vestibular nerve produces a loss of function of some of the fibers, with resulting imbalance. Rarely is the loss of function abrupt enough to produce vertigo.

Imbalance also is present in a stage of Meniere's disease. This may occur late in the disorder as a continuous symptom, or it may occur in late stages of the active episodes.

Loss of labyrinth function is a third cause of imbalance. This occurs for a short time, with relatively rapid recovery after the loss of one labyrinth, as in surgery, head injury, vascular accident, or viral labyrinthopathy.

Bilateral loss of labyrinth function is more disabling, particularly in older persons. Streptomycin is the most frequent cause of bilateral loss of labyrinth function. Loss also may occur in severe head injuries, meningitis, or viral labyrinthitis. Young persons can compensate remarkably well to the loss of both labyrinths. Many young people with no demonstrable labyrinthine function are able to participate in athletics. Older persons are seriously handicapped. They are unable to fix the vision on a given spot while in motion. This prevents them from driving a car or recognizing a friend while walking on the street. Although they can walk reasonably well on a smooth surface and in good light, their locomotion is seriously impaired in darkness or when walking on uneven surfaces, for example, a plowed field.

Because streptomycin is the principal cause of this disorder, its use should be carefully considered in older persons or those with impaired renal function. Studies have shown that the labyrinth selectively concentrates streptomycin, and this probably accounts for its selective toxicity to this organ. When the drug is used in large doses or for long periods, periodic tests of labyrinth function should be performed to guard against insidious development of labyrinthine damage, which is not evident to the patient so long as he remains in bed.

SUMMARY

Dizziness is a term that the patient uses loosely to denote a wide range of sensations, including vertigo and imbalance. Vertigo refers to a hallucination of motion, imbalance to a milder sense of dysequilibrium. Both terms have definite causes and denote specific symptoms that have diagnostic importance. □

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Social Security Numbers Required by Insurance Carrier

Revenue Ruling 69-595 requires that all insurance companies and Blue Cross-Blue Shield organizations must file an information return on any physician or dentist being paid an aggregate of $600 or more during any calendar year. In order to properly file such a return it is necessary for the carriers to have the individual physician's Social Security number or his IRS identifying number.

Federal law specifies that an individual's Social Security or IRS identifying number must be given to any person who is required to file an information return. The number is used for identification purposes.

An identical ruling has been in effect for Medicare and Medicaid payments for over a year. However, payments from private insurance companies and Blue Cross-Blue Shield organizations were not reportable until January 1st of this year.

Since an insurance company does not know at the first of each year whether or not its payments to individual physicians will total $600 or more, they are forced to assume that it will and to require the physician's identifying number with the very first claim. They then can use the Social Security number so that the proper information can be retrieved from their files for the information report at the end of the calendar year.

A request for an individual's identifying number has the authority of law. In the event a physician would refuse to divulge the number, the insurance company has the right to withhold payment of the claim.

In a letter to the entire association membership, Ed Calhoon, M.D., OSMA President, advised physicians of the new regulation.

The voluntary inclusion of the number will allow the carriers to obey the law and will forestall a chain of correspondence.

To facilitate matters many insurance companies are updating their claim forms to provide a space for insertion of the identifying number. However, since many companies had a huge backlog of forms already printed, some forms will not have such a space for some time to come. In such an event, the physician may simply include his Social Security number as a part of his name and address. Such a routine procedure will allow a carrier to process the claim without resorting to voluminous correspondence.

Claims submitted to Medicaid (the medical assistance program administered by the Department of Public Welfare) supposed to contain the Social Security number of the physician submitting the claim. This is a regulation of the department that is felt to be necessary for proper identification whenever state money is being disbursed. □

Court Decisions Affect Abortion Laws

Changes in the abortion laws of the various states of the nation are being wrought by legislation and court decisions. After Colorado became the first state to modernize its' abortion laws on April 25th, 1967, a number of other states quickly followed suit.

As of January 1st, thirteen states had updated, and often liberalized, their abortion laws. A number of other states were finding their abortion laws changed by court decisions.

While most of the cases involved older abortion statutes, California found its 1967 abortion statute under attack. In January of last year a California trial court held the new statute unconstitutional since it improperly delegated legislative power and violated the equal protection and due process clauses of the United States Constitution. The court went on to say that women may determine whether or not to bear children and that right may not be interfered with by the state.

The California trial court ruled that under the constitution women have a total freedom of choice as to whether or not to bear children, including the unrestricted right to have an abortion, and the state may not interfere in this area in the absence of a "compelling state interest."

This latter phrase, "compelling state interest," has appeared in a number of cases involving abortion statutes. The California trial court said that when the original abortion statutes was adopted in 1850, the state had a compelling interest in the preservation of the life of the woman involved because of the dangers. However, it went on to point out that there is no longer any great danger from an abortion. It also said that the state no longer has a compelling interest in increasing its population.

More importantly the California court commented, "The abortion statute cannot be justified by any supposed state interest in the preservation of the life of the unborn. It is not clear just when there is life present in the eyes of the law. A legislative declaration that life begins at conception would constitute the adoption of a philosophy of one of the country's major religions, an act which would clearly be in violation of the first amendment."

Texas

A federal trial court has held that Texas abortion statute to be unconstitutional on the ground that it was overbroad and vague. However, the court denied a petition to enjoin

Texas authorities from enforcing the statute.

Parties who brought the suit contended that a decision declaring the abortion laws of Texas unconstitutional would warrant issuance of a court order enjoining state enforcement of the laws. The court denied the petition and cited the federal policy of non-interference in state criminal prosecutions as its reason.

In the case the court observed that since the abortion statute infringes on the right to choose whether or not to have a child, the burden is on those defending the statute to demonstrate to the satisfaction of the court that such infringement is necessary in order to support a "compelling state interest." The three judge court held that this burden had not been met.

Since the state has a legitimate interest in assuring that abortions are performed by competent persons in adequate surroundings, the court admitted that there was compelling justification for state interference. However, it went on to point out that the Texas abortion statute went far beyond this area of interest by prohibiting all abortions except those performed for the purpose of saving the mother's life. This sweeping limitation was cited as the court's reason for declaring the statute unconstitutionally overbroad and unconstitutionally vague.

Wisconsin

Wisconsin's abortion statute didn't fare any better than Texas' with a three-judge federal court. In early March of last year the court declared a statute which prohibited an abortion at anytime after conception to be unconstitutional.

Wisconsin's statutes prohibit a physician from performing an abortion unless two other physicians agree that the abortion is necessary to save the mother's life. A physician was charged with performing without being so advised. He filed suit in federal court seeking to have the statute declared unconstitutional and seeking an injunction restraining the state officials from enforcing the abortion statute.

The court declined to grant the injunction on the same grounds cited by the federal court in Texas, *i.e.* that the court will not interfere with a state criminal prosecution unless the circumstances are exceptional.

In concluding that the mother's interest are superior to those of an unquickened embryo, the court pointed out that it did not purport to decide the right to abort a quickened fetus. It went on to say that a woman's right to refuse to carry an embryo during the early months of pregnancy transcends the "rights" of the embryo, and that the mother's rights may not be invaded by the state.

It was noted that there are a number of situations where there are forceful reasons to support a woman's desire to reject an embryo. These include a Rubella or a Thalidomide pregnancy, or one resulting from rape or incest. The court held that even when none of these circumstances exist, the state does not have a compelling interest to require a woman to remain pregnant during the early months following conception.

New York

Even though the state of New York is known to have the most liberal abortion law, this fact in itself has caused trouble. A malformed child and her parents both brought suit against a hospital for refusal to abort the mother after there was evidence that the mother was infected with Rubella.

Even though New York law provides that abortion is a matter to be determined by the patient and the physician, many hospitals have established abortion committees to pass on a case before allowing the abortion to be performed in the hospital. In this case two of the physicians on the committee had doubts that Rubella was present and the committee was divided as to the necessity or desirability of performing an abortion.

Even though the jury found in favor of the infant, the trial court directed judgment for the hospital notwithstanding the verdict. The jury also returned a verdict for the parents, and that judgment was reversed on appeal.

The court held that a cause of action by an infant for failure to abort the mother is not "cognizable at law." Likewise, an action by parents for refusal to abort the mother is one not previously known to the law. The court concluded that it would be virtually impossible to evaluate compensatory damages for the anguish resulting from rearing a malformed child as against the denial to them of the benefits of parenthood.

Colorado

On April 25th, 1967, Colorado became the first state to modernize its abortion laws. In doing so it determined that therapeutic abortions would be allowed to preserve the physical or mental health of the mother, to prevent birth of a child with physical or mental deformity, and when pregnancy results from

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Although the Colorado statute does not require that the woman be a resident of the state, it does specify that the abortion must be performed in an approved hospital after it has been passed on by a special therapeutic abortion committee. Since the physician that is going to perform the procedure must justify it to the committee, as a practical matter he will be reluctant to accept a case from outside of the state without a proper referral and complete medical documentation by the patient's personal physician.

Contiguous States

Four of the six states contiguous to Oklahoma have updated their abortion laws. Colorado being the first in 1967 was followed by Arkansas, Kansas, and New Mexico in 1969. Both Missouri and Texas simply state that abortions can only be performed to preserve or save the life of the mother.

Arkansas, Kansas and New Mexico allow abortions to preserve the mental or physical health of the mother, to prevent the birth of a child with physical or mental deformity, and when pregnancy results from rape or incest. Arkansas requires that the patient be a resident of the state, while the other two do not. □

Arkansas-Oklahoma Cancer Forum Slated

On March 12th-13th, 1971, the Arkansas-Oklahoma Cancer Forum will hold its third joint meeting at Fountainhead Lodge on Lake Eufaula. The scientific meeting will be a day and a half of formal talks and panels.

The first morning will be devoted to the basic sciences concerning cancer and will feature discussions about biochemistry and changes in the cancer cell at the molecular level. The role of viruses and their probable role in connection with the causation of cancer will be stressed by members of the National Cancer Institute.

Roy Hertz, M.D., formerly of NCI, will speak on clinical induction of experimental cancer. Molecular action of antibiotics and chemotherapy will be discussed by Everett Rhoades, M.D., of the University of Oklahoma Medical Center. Doctor Ingegerd Hellstrom of Seattle, one of the foremost cancer immunologists, will present the basic mechanism of cellular response to cancer.

On Friday afternoon, William E. Powers, M.D., of St. Louis, will talk to the group about the role of radiotherapy in the palliative treatment of cancer. Also appearing during the afternoon will be Arthur I. Holleb who is senior vice-president for Medical Affairs for the American Cancer Society in New York.

The newer trends in the treatment of curable cancer will be the subject for discussion on Saturday morning. Included during this session will be a discussion of the recent classification of breast cancer and modern therapy. Jack M. Stephenson, M.D., of the Oklahoma City Medical Arts Laboratory will talk on carcinoid tumor.

Following each of the formal presentations on both days, there will be a panel discussion with informal questions from the floor. Moderators will be Leonard P. Eliel, M.D., interim executive vice-president for OU Medical Center affairs and director of the OU Medical Center; John B. Nettles, M.D., Tulsa, Obstetric and Gynecology Coordinator of the Tulsa Medical Center; and, Gilbert Campbell, M.D., Professor of Surgery and Head of the Department of the Surgery at the University of Arkansas School of Medicine, Little Rock. □

Society of Nuclear Medicine To Convene

Houston's Marriott Motor Hotel will be the site of the Sixteenth Annual meeting of the Southwestern Chapter of the Society of Nuclear Medicine on March 19th-21st, 1971. States included in the chapter are Arkansas, Louisiana, Oklahoma and Texas.

Inquiries concerning the meeting should be directed to Herbert C. Allen, Jr., M.D., Secretary-Treasurer, 100 Herman Professional Building, Houston, Texas 77025. □

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Labor and Liberals Push National Health Insurance

Organized labor has joined with the liberal elements of Congress led by Senator Ted Kennedy to promote an all out push to pass a national health insurance bill during this session of Congress. The bill designated S-3, has the official title of "Health Security Act of 1971."

Backing for the Kennedy bill is coming from the United Auto Workers and from the AFL-CIO. Chief lobbyist for the AFL-CIO said, "We are going to win the fight at this session of Congress." UAW President Leonard Woodcock commented, "The time has come and that time is this session of Congress."

Last year the two labor groups and Kennedy all had separate bills. They have now joined forces to support the Kennedy bill which is almost identical to the one he introduced last year.

Backers of the health security act estimate that in 1973 the program will cost a mere $57 billion. HEW says the cost will be closer to $77 billion.

When asked about the staggering costs of the bill and the added tax burden it would put on the workers, UAW President Woodcock commented that he wasn't particularly worried since the **workers tax would remain a negotiable item in collective bargaining and that the auto companies might be asked to pick up the entire tax.**

Organized labor has also stated publicly that some form of national health insurance will be the number one domestic issue promoted by labor in 1971 and during the 1972 presidential election year.

The following is a summary of the Kennedy bill as introduced last year. The bill introduced in early January of this year is almost identical.

Health Security Act

The Health Security Program would provide benefits to every resident of the United States and every non-resident citizen while within the U.S. It would establish a mechanism to provide benefits both for resident aliens who would be exempt from U.S. taxes and for U.S. citizens living in other countries.

The bill would provide comprehensive health care benefits. This would include primary medical services and specialized services furnished by physicians, psychiatric services if furnished by a comprehensive health service organization or other approved facility, or up to 20 consultations for ambulatory care.

The bill would provide coverage for professional services of dentists for persons 15 years of age or younger. This would be expanded as soon as possible to cover all persons. Covered dentist services would be preventive, diagnostic, therapeutic, except orthodontic, and services required for rehabilitation following injury, disability or disease.

Institutional services provided would include inpatient and outpatient hospital services, up to 120 days per spell of illness of skilled nursing home services and of home health service agencies. Inpatient institutional services would be covered only on proper certification of the medical necessity for such services.

Drugs

Two categories of drugs would be covered under this program. A list of drugs would be prepared for use in participating institutions and comprehensive health service organizations. The list would be designed to provide an armamentarium necessary and sufficient for rational drug therapy incident to comprehensive medical services or covered dentist services. A second list of covered drugs would be prepared, which would be for use outside these institutions and organizations. This list would include only drugs for use in the treatment of chronic diseases and for conditions for which drug therapy commonly imposes substantial financial hardship.

A list of covered therapeutic devices, appliances, and other equipment would be prepared. Other covered services would include professional services of optometrists and podiatrists and the diagnostic services of independent pathology laboratories and of independent radiologists, as well as ambulance and other emergency transportation services. Certain services such as physiotherapy, nutrition, social work, or health education services would be covered when they are part of the institutional services or they are furnished by a comprehensive health service organization.

Excluded from coverage would be services furnished under workmen's compensation, in public schools, and cosmetic surgery. Also services would not be covered if they are furnished to a person enrolled in a comprehensive health service organization and could be provided by that organization but are furnished by another provider or if they are primary physician services and are furnished by a provider to a person who is on the list of a physician or dentist who has elected to be paid

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Participation

To participate in the program, providers would have to meet certain conditions and qualifications and would have to agree that services would be provided without discrimination, without charge beyond that authorized by the title, and that the provider will furnish the information needed for effective utilization review by professional peers. Qualifications are established for all providers under this program. A physician would have to be legally authorized to practice in his state. Practitioners initially authorized to practice after June 30th, 1973 would have to meet national standards established by the Health Security Board for the practitioner's practice. If the practitioner meets these standards and is a qualified provider in one state, he would be qualified in any other state to provide services covered by the program. By July 1st, 1975, the Health Security Board would establish those requirements of continuing education it finds reasonable and necessary to maintain and enhance the quality of professional services. Failure to meet these requirements would cause a practitioner to cease to be a qualified provider.

A physician could not perform major surgery as a covered service or furnish other covered specialized services unless he holds a certificate from the appropriate national specialty board or possess the qualifications needed for certification.

The bill would require utilization review plans for general or psychiatric hospitals and for skilled nursing homes. Skilled nursing homes and home health service agencies would have to have transfer agreements with at least one participating hospital.

The bill provides that in establishing standards and other requirements, the Health Security Board would take into consideration standards or criteria established or recommended by any appropriate professional or other association or organization.

Financing

The program would be financed through a Health Security Trust Fund. Payments to the Fund would be made through employee taxes on a wage base of $15,000, 2.1 percent on employees and 3.5 percent on employers. The Federal Government would contribute from the general revenues 66⅔ percent of the combined employer-employee amount. The Health Security Board would determine annually the maximum amount which could be obligated from the Trust Fund for payment of covered medical care.

The bill also would establish a Health Resources Development Account in the Health Security Trust Fund which would obligate two percent of the total Fund in 1974, increasing to five percent for fiscal year 1980 and thereafter.

The Health Security Board would

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annually allocate to each region the funds which would be available to that region to cover expenditures for services provided under the bill. The Board would attempt in this process to eliminate the existing differences among the regions in the average per capita cost of health services. The Board would further divide the allocation to each region according to class of services. This would set the amount of money available in each region for institutional services, physician services, dentist services, drugs, etc. Finally, the Board would annually allocate the funds available for each class of service to each of the health service areas in each region.

Payment

The bill would set up the methods for payment to professional practitioners. Each practitioner could elect to be paid by a fee-for-service method. However, a fee schedule would be established. Practitioners also could elect to be paid by a capitation method.

When the Board deems it necessary, it could pay an independent practitioner a full-time or part-time stipend in lieu of or as a supplement to other compensation and it could reimburse the practitioner for special continuing professional education and other necessary costs. This would be used to encourage rural practice.

The amounts allotted in each health service area for payment of physician services would be used first to provide for payment to be made by the Board on a budget or stipend basis or on any basis other than capitation, fee-for-service, or per case. The remainder would be available for capitation payment based on a set amount for each resident in the area. The funds remaining after capitation payments have been made would be available for making fee-for-service and per case payments.

Hospitals would be paid according to a prospective budget approved by the Health Security Board. Psychiatric hospitals, skilled nursing homes, and home health service agencies would be paid in the same manner.

Maximum product prices would be determined for the payment of the cost of drugs. Payment to an independent pharmacy would consist of the cost of the drug to the pharmacy plus a dispensing fee approved by the Board.

Payments to comprehensive health service organizations would consist of basic capitation payments plus 75 percent of any savings made when utilization is compared to the average utilization made by any comparable group not enrolled in a comprehensive health service organization. Services would have to be of high quality and meet the needs of the enrollees.

Planning

The bill would authorize $200 million for fiscal 1971, $400 million for fiscal 1972, and $600 million for fiscal 1973 to inaugurate a planning program to strengthen the nation's resources of health personnel and facilities and its system of delivery of health services. This would be completed by July 1st, 1973. After July 1st, 1973, a program would be established to reinforce the operation of the health security program as a mechanism for the continuing improvement of the supply and distribution of health personnel and facilities and the organization of health services.

A continuous process of health service planning would be instituted in collaboration with state comprehensive health planning agencies. In all planning, emphasis would be placed on improving and expanding the available resources for and accessibility of services to ambulatory patients.

The Board would establish schedules of priority for the recruitment, utilization, and training of the personnel most urgently needed in the health security system. The Board would provide the education or training for these shortage personnel if other assistance is not available or is inadequate.

Administration

The program would be administered by a five-man Health Security Board appointed by the President.

There would also be a National Health Security Advisory Council, regional and local advisory councils, and professional and technical advisory committees.

The Board could order providers, as a condition of continuing participation, to discontinue or initiate certain services, to furnish services at a place where the provider does not currently do so, or to enter into arrangements with one or more other providers for the transfer of patients or the making available to one provider the skills of another.

Benefits provided under this program would begin July 1st, 1973. □

Noted Cardiologist To Speak in Oklahoma

Doctor Borys Surawicz, internationally recognized cardiologist and the Oklahoma Heart Association's visiting professor of cardiology, will present a lecture at 8:30 a.m., February 23rd at Presbyterian Hospital, Oklahoma City. All interested physicians are invited to attend.

Doctor Surawicz, professor of medicine and director of cardiovascular division, University of Kentucky College of Medicine, will be in Tulsa February 22nd, where he will lecture at 8:00 a.m. in the main conference room at Saint Francis Hospital.

Each year the Heart Association brings a well known heart specialist to Oklahoma as part of the observance of Heart month.

Born in Moscow, Russia, Doctor Surawicz came to the U.S. in 1951 and completed an internship and residency at DeGoesbriand Memorial Hospital, Burlington, Vermont.

He was a member of the faculty of the University of Pennsylvania Graduate School of Medicine and the University of Vermont College of Medicine before going to the University of Kentucky in 1962 as associate professor of medicine and director of the cardiovascular division.

Doctor Surawicz is a member of numerous medical groups. □

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OSMA Meeting Set For Late April

Preparations for the 65th annual meeting of the OSMA are now being finalized. Traditionally the meeting is held the second weekend in May, but this year it will be held April 29th-May 1st, in the Tulsa Assembly Center.

Floyd Miller, M.D., general chairman of the meeting, has released a tentative schedule of events for this year. He recently announced that Al Capp, creator of L'il Abner, will be a special guest speaker on Saturday afternoon, May 1st.

While the scientific and business activities will take place in the Tulsa Assembly Center, most of the entertainment functions are set for the Fairmont-Mayo Hotel. A large cocktail party is scheduled for Friday evening, and the annual President's Inaugural Dinner-Dance will be held Saturday evening, May 1st. Entertainment for the dinner-dance will be furnished by the Oral Roberts University World Action Singers. This group has already established a world-wide reputation for musical excellence.

Six general interest scientific symposiums are scheduled for the three days. In addition, two special presentations are also scheduled.

The first special presentation will be at 11:00 a.m. on Friday morning, April 30th. R. Maurice Hood, M.D., of Austin, Texas, will speak on "Wounds and Illnesses That May Have Changed the Course of the Civil War." The second special presentation will be given at 1:00 p.m. on Saturday afternoon, May 1st. Eugene F. Balangero, M.D., Montreal, Canada, will speak on "Experience of Canadian Physicians With Government Controlled Medicine."

Al Capp's presentation, "Ask Al Capp," will be at 2:30 p.m. on the stage of the Tulsa Assembly Center. Capp's entire presentation is extemporaneous and he starts off by asking all members of the audience to submit written questions to him. He describes himself as an expert on nothing with opinions on everything.



AL CAPP

The popular stage-door luncheons will be held again this year. A picnic style bill of fare will be offered both Friday and Saturday at noon on the stage of the auditorium. It will be free to all registrants and exhibitors.

The following is the proposed schedule of events for the April 29th-May 1st meeting:

THURSDAY, APRIL 29th, 1971

2:00 p.m. **"Lumps in the Neck," including Thyroid Diseases**
Guest speaker—John C. Gaisford, M.D., Pittsburgh, Pennsylvania
Panel will include surgeon, internist, and radiologist.

7:00 p.m. House of Delegates

FRIDAY, APRIL 30th, 1971

9:00 a.m. **Gastroenterology Symposium With Special Emphasis on Changing Concepts of Hepatitis**
Guest speaker—Leslie J. Schoenfield, M.D., Los Angeles, California
Panel will include internist, surgeon, and pediatrician.

11:00 a.m. **"Wounds and Illnesses That May Have Changed the Course of the Civil War"**
R. Maurice Hood, M.D., Austin, Texas.

12:00 noon Stage Door Luncheon

2:00 p.m. **Symposium on Diabetes**
Guest speaker—Marvin Levin, M.D., St. Louis, Missouri
Panel will include internist, pediatrician, and general practitioner.

6:00 p.m. Cocktail Party—Fairmont-Mayo Hotel

SATURDAY, MAY 1st, 1971

9:00 a.m. **Society of Internal Medicine Symposium**
"The Newer Antibiotics: Their Therapeutic Indications and Effectiveness"
Francis J. Carey, M.D., St. Louis, Missouri
"Allied Health Personnel in the Internist's Office"
Frank A. Riddick, Jr., M.D., New Orleans, Louisiana
"The Physician's Assistant Program in Oklahoma"
Thomas N. Lynn, M.D., Oklahoma City and Mr. William Stanhope (Physician Assistant), Oklahoma City.

9:00 a.m. **Dermatology Symposium**
Guest Speaker — Mage Hunneycutt, M.D., Little Rock, Arkansas.

9:30 a.m. **Symposium on Acute Arterial Injury.**
Moderated by Lazar J. Greenfield, M.D., Oklahoma City
Other speakers: Kemper Lain, M.D., Oklahoma City
G. Rainey Williams, M.D., Oklahoma City
Albert Shirkey, M.D., Tulsa.

9:00 a.m. House of Delegates

12:00 noon Stage Door Luncheon

1:00 p.m. **"Experience of Canadian Physicians with Government Controlled Medicine"**
Eugene F. Balangero, M.D., Montreal, Canada.

2:30 p.m. **"Ask Al Capp"**
Al Capp, Creator of L'il Abner

6:00 p.m. Cocktail Party—Fairmont-Mayo Hotel

7:00 p.m. Inaugural Dinner-Dance (Entertainment by World Action Singers) □

OSMA Membership Reported

Of OSMA's 2,185 members, 1,931 are in private practice.

Of this number 69 are listed as residents or fellows, 55 as full time hospital staff, 52 full time medical school faculty, 10 in full time administrative medicine, eight full time researchers, and 60 retired or not in practice. □

Improper Forms Cause Payment Delay

Recent studies indicate that many physicians or their office staffs are not filing Medicare and Medicaid claim forms properly filled out. Confusion particularly seems to revolve around the meaning of the term "itemized bill."

Federal regulations instruct the Medicare and Medicaid carriers to require bills which are sufficiently itemized so that the exact procedure performed can be identified. In addition, Medicaid, operated by the Department of Public Welfare, requires that each procedure be identified by the proper procedure code. Medicare does not require coding on the claim form.

Breaking down the charges into itemized bill form expedites the handling of the claim. Each bill or receipt should show the date of service, the type of service, and the charge for each individual service rendered by the physician. Whenever a claim form combines charges it must be given special handling by the carrier and additional information has to be sought from the physician.

Medicare cannot return a claim form to a physician. Federal regulations say that once the claim form is in the carrier's possession, the carrier must do all additional work necessary to process the form. If the form is incomplete, the carrier has to call the doctor's office and seek additional information. A properly itemized claim will reduce unnecessary delays in claim payments by avoiding repeated telephone calls to the doctor's staff to secure the needed information.

Regulations of the Department of Public Welfare require that improper Medicaid forms be returned to the physician for additional information or correction.

If a patient is going to file his own Medicare claim, the physician's staff should explain to the patient that the "itemized" receipt or statement should be accompanied by a "request for Medicare payment form." All questions on the payment form should be filled out in their entirety. This same practice applies whenever a doctor accepts an assignment.

The Department of Public Welfare reports that some Medicaid claim forms are being improperly coded. In particular many physicians are using a code number for an extended office visit (9001 or 9002) and then charging only for a routine office visit (9003 or 9004). The result is that they are pulling their profile for the extended office visit down and freezing their own fee at a lower level.

The Department also reports that some physicians are routinely coding and billing for the extended office visits (9001 or 9002), but the description of service rendered does not justify the coding or charge. A Department spokesman said that anytime the extended office call code is used there should be sufficient information included on the claim form to justify the higher fee.

Computer processing of claims has also uncovered some irregularities in billings for office visits. The computer now checks back into a patient's history to determine whether or not the extended initial office visit for a new patient code has been used previously. It also checks the frequency of the use of codes to designate a routine initial office visit for a new patient (9000), and initial or subsequent office visit requiring complete diagnostic history and physical examination (9001). When these begin to show up regularly in a patient's history the claims are automatically subjected to close review.

Physicians or their staffs needing additional information should feel free to direct their questions and information requests to the following people:

Medicare Claim Administration, in care of Aetna Life and Casualty Company, 7 South Harvey, Oklahoma City, Oklahoma 73102, telephone AC 405, 232-3533.

Department of Public Welfare, Medical Services Division, Sequoyah Office Building, State Capitol, Oklahoma City, Oklahoma. Telephone AC 405, 521-3801. □

Drug Abuse Seminars Set

Tulsa's Camelot Inn will be the site of the third OSMA Drug Abuse Seminar for physicians, March 11th, 1971. Additional seminars have now been set for Lake Texhoma State Lodge and Quartz Mountain State Lodge near Altus.

Scheduled for Thursday evening, March 11th, the Tulsa seminar is the third in a series of six seminars being conducted by the OSMA's Alcoholism and Drug Abuse Committee to familiarize physicians with the short term diagnosis and treatment of the drug intoxicated patients.

A part of the seminar schedule was the recent distribution to all OSMA physicians of the "Drug Abuse Treatment Manual" which was compiled and prepared by the members of the Alcoholism and Drug Abuse Committee.

The Tulsa Camelot Inn meeting will start at 7:00 p.m. in the Great Hall. Following dinner, a film depicting today's drug culture will be shown. This will be followed by a presentation on "Acute Symptoms and Management of Drug Users" by Jim Earls, M.D., Associate Professor of Psychiatry at the OU Medical Center.

A panel discussion with questions from the audience will close out the meeting. Faculty for the panel includes Al Parades, M.D., Professor of Research Psychiatry; Tom Donica, M.D., Associate Professor of Psychiatry; and Jim Earls, M.D., all of the OU Medical Center.

Frank Adelman, M.D., Enid psychiatrist, chairman of the special subcommittee which organized and planned the entire seminar series will act as moderator.

Two and one-half hours of credit from the American Academy of General Practice has been requested for each seminar.

Registration fee for each of the seminars will be $10 per person, to cover the cost of the meal and program expense. Material for advanced registration will be sent to physicians in the area surrounding each seminar site. Physician's wives and office personnel are in-

vited to attend, but must pay the $10 registration fee.

Quartz Mountain State Lodge near Altus will be the site of the fourth seminar. Scheduled for Thursday evening, April 8th, the Altus meeting will start at 6:30 p.m. with dinner being served at 7:00.

The fifth seminar in the series will be held at Lake Texhoma State Lodge on Thursday evening, May 13th. The sixth seminar will be held on June 10th in Oklahoma City. □

School of Health Becomes Reality

Preparation of working drawings for an approximately $10 million School of Health building in the University of Oklahoma Medical Center will begin immediately according to Dean William W. Schottstaedt.

The Medical Center's application for a $7,028,296 federal construction grant last July was approved by the Department of Health, Education and Welfare subject to the availability of funds, and although notification of award of funds has not been received, Doctor Schottstaedt was optimistic that financing will be forthcoming within the year.

The proposed structure, to consist of two interconnected towers of five and six stories, will house the three-year-old School of Health, presently quartered in several residential buildings near the Medical Center in the 600 block of NE 15th Street.

It will be constructed in the central area of the Oklahoma Health Center development between NE 10th and 11th Streets, Stonewall and Kelley, a block from the site of the new State Department of Health office building and laboratories now under construction.

Some moneys from the 1968 HERO bond issue will be applied toward construction and equipment costs.

Building of adequate facilities would permit tripling the present enrolment of 146 persons working toward graduate degrees in the areas of biostatistics and epidemiology, environmental health, health administration, human ecology, parasitology and laboratory practice and community health.

Preliminary drawings completed by Murray Jones Murray, Tulsa architects - engineers - planners, provide for classrooms, student laboratories and study carrels, research animal facilities, faculty offices and laboratories, a reading room, lecture room, audio-visual facilities, administrative offices and services area, a total of 101,000 square feet.

The School of Health is one of the newest professional schools in the OU Medical Center, which now also embraces the Schools of Medicine, Nursing, Health Related Professions, and Dentistry, and the Graduate College-Medical Center. The School of Pharmacy later will relocate from the Norman campus to the health complex in Oklahoma City.

Fully accredited by the American Public Health Association since its establishment, the school has shown a steady increase in enrolment from an initial student body of approximately 80. □

Groom Named To National Committee

Dale Groom, M.D., Director of the Oklahoma Regional Medical Program, was recently elected Vice-Chairman of the National Steering Committee, an organization representative of the 55 national Regional Medical Programs. He was selected for the post at the national meeting of the program on January 7th, in Bethesda, Maryland.

The steering committee is an ad hoc group formed to provide the national organization with constructive comments from the 55 regional programs. It is composed of program directors from the various areas which form the national program. Doctor Groom is the representative of the South-Central Area which includes Oklahoma, Texas, Arkansas, Kansas, and Missouri.

As director of the Oklahoma Regional Medical Program, Doctor Groom is responsible for maintaining the effectiveness of its efforts in combating heart disease, cancer, stroke, renal disease, and related diseases. As vice-chairman of the National Steering Committee, he will aid in providing the two-way communication between national and regional organizations necessary for the continuance of the overall Regional Medical Program. □

Health Department Offers Rubella Vaccine

A quantity of Rubella vaccine is now available to state physicians free of charge from the Oklahoma State Department of Health. The vaccine was provided to the state through a federal grant.

Although Oklahoma ranks eighth in the nation in immunizations level against this disease because of the Rub Out Rubella Campaign last year, both the Department and the OSMA are urging physicians to continue innoculating Oklahoma youngsters.

Physicians interested in obtaining a quantity of the vaccine for distribution to their patients should contact the local county health department or the Oklahoma State Department of Health in Oklahoma City. The physician must pledge that he will not charge for the vaccine, but this does not preclude a charge for its administration. □

AHA and AMA Urge Licensure Moratorium

Proliferation of allied health manpower licensure laws have caused the American Hospital Association and the AMA to call for a moratorium on licensure of additional categories of health personnel.

The AHA's action took place during its annual meeting. The AMA's House of Delegates took a similar position on licensure at its last clinical convention in Boston. AHA said "current trends toward licensure of health care personnel forecast possibilities of legal entanglements, scope of functions, and flexible use of manpower."

The policy applies to such occupations as hospital administrators, inhalation therapists, medical laboratory technologists, occupational therapists, operating room technicians, physical therapy assistants, physician's assistants, psychiatric technicians, radiologic technologists, and social workers. □

DEATHS

JOSEPH W. FUNNELL, M.D.

1921-1971

Joseph W. Funnell, M.D., a 49-year-old Oklahoma City physician, died January 31st, 1971. A native of Alleryon, Iowa, Doctor Funnell came to Oklahoma City in 1945 and was graduated from the University of Oklahoma School of Medicine in 1949. Following postgraduate work in New Jersey and Chicago, he established his practice in Oklahoma City.

Doctor Funnell was a Diplomate of the American Board of Obstetrics and Gynecology, a Fellow of the American College of Surgeons; a member of the American College of Obstetrics and Gynecology, the Osler Society, the Southern Medical Association, the Alpha Omega Alpha and Phi Chi, medical fraternities.

HOWARD B. SHORBE, M.D.

1909-1971

A well-known, Oklahoma City orthopedic surgeon, Howard B. Shorbe, M.D., died January 24th, 1971. Born in Coalgate, Oklahoma, Doctor Shorbe was graduated from the Northwestern University Medical School in 1934. His practice was established in Oklahoma City where he was also a Clinical Professor of Orthopedic Surgery at the University of Oklahoma School of Medicine.

Doctor Shorbe was a member of the American Board of Orthopedic Surgeons, a Fellow of the American College of Surgeons, a member of the American Orthopedic Association and the American Academy of Orthopedic Surgeons.

HARRY D. MURDOCK, M.D.

1879-1970

Harry D. Murdock, M.D., 92, a practicing surgeon in Tulsa for more than 50 years, died December 26th, 1970. Born in Brodhead, Wisconsin, Doctor Murdock graduated from Rush Medical College in 1905. He began his practice in Tulsa in 1910, retiring in 1957.

In 1955, the Oklahoma State Medical Association awarded Doctor Murdock a Life Membership in recognition of over a half century of devoted service to his profession and humanity.

HENRY T. BALLANTINE, M.D.

1881-1970

A long-time, Muskogee physician, Henry T. Ballantine, M.D., died in Boston, Massachusetts, December 27th, 1970. A native of Calhoun, Kentucky, Doctor Ballantine received his medical degree in 1907 from Vanderbilt University School of Medicine. His practice was established in Muskogee in 1909.

The OSMA honored Doctor Ballantine in 1962 with the presentation of an Honorary-Life Membership for his outstanding services to his community and over 50 years of medical practice.

GORDON W. BUFFINGTON, M.D.

1920-1971

A former Oklahoma physician, Gordon W. Buffington, M.D., 50, died in Muncie, Indiana, December 14th, 1970. A native of Pryor, Oklahoma, Doctor Buffington was a 1950 graduate of the University of Oklahoma School of Medicine. Following his internship, he established his practice in Tahlequah, Oklahoma. In 1965, he joined the Ball State Health Service in Muncie. He had served with the U.S. Navy during World War II. □

BOOK REVIEWS

CURRENT CONCEPTS IN OPHTHALMOLOGY. By Bernard Becker, M.D., Professor and Head of the Department of Ophthalmology, Washington University School of Medicine, St. Louis, Missouri, and Ronald M. Burde, M.D., Department of Ophthalmology, Washington University School of Medicine, St. Louis, Missouri. Volume II. cloth, 267 pp. with 238 illustrations. St. Louis: The C. V. Mosby Company, 1969. $21.00.

This is volume II in the CURRENT CONCEPTS IN OPHTHALMOLOGY series. Like the first volume, it covers selected topics which need clarification in the light of present day knowledge and presents the views and practice of present and former ophthalmologic staff members of Washington University.

Selected subjects, ranging from plastic surgery and retinal cryosurgery to a critique of gonioscopy and definition of problems relating to dyslexia, are well covered with clearly related descriptions of means, methods and opinions of current therapeutic concepts.

Though directed primarily to those practicing ophthalmology, other physicians will find several sections informative. However, the expense makes it likely it will be purchased primarily by libraries and ophthalmologists particularly interested in the topics covered in this volume.
Ben C. Pendarvis, M.D.

THE ROLE OF LEARNING IN PSYCHOTHERAPY. By Ruth Porter, (Ed.). Hard bound, 340 pp., with two illustrations. Boston: Little, Brown & Co., 1968.

The purpose of this symposium was to provide a forum for presenting information from psychodynamic theory regarding psychotherapy and the more recent behavioristic based data on learning theory as applied to psychotherapy. A reconciliation or drawing together of information was hoped to be possible by participant's focusing on the "neutral" ground of the role of learning in psychotherapy. To facilitate reaching this goal, the participants in the

symposium represented a broad spectrum of professionals ranging from primate researchers, educators, rigorous behavior therapists to psychoanalysis. All contributed a paper generally oriented to providing information relevant to the psychotherapeutic process with the common denominator being some reference to learning. Following the formal presentation of each participant's paper, discussion was encouraged. Based upon the order of presentation of the articles and subsequent discussions, two interesting phenomena occurred. First, vested professionals tend to minimize theoretical differences early in a discussion. Second, after participants "let their hair down," they frequently assume extreme positions to support their theoretical positions.

The result of this symposium was a series of excellent summary articles dealing with theoretical, applied and research aspects of learning and psychotherapy. When combined with the discussions, this book provides a clear and relatively concise statement as to the differences in opinion regarding issues which have arisen between the behavioristic psychotherapist and the psychotherapist employing a dynamic theoretical framework. Specifically, the issues presented revolve around the behavior therapist focusing on observed behavior and the consequence of behavior change. He is less likely to concern himself with "basic personality changes in the patient" and focus more on the possibility that a relatively small change in overt behavior may give rise to considerable changes in one's overall life situation. In contrast, the psychodynamically oriented psychotherapist stresses the concept of symptom and the underlying disease it represents. Alteration in overt behavior is therefore not considered sufficient unless underlying personality change accompanies it. The psychodynamic therapist argues that to change behavior without there being basic personality change only results in symptom substitution.

In summary, this symposium provides a concise and clear statement as to differences in position among behavioristic and psychodynamic psychotherapists. The attempt to focus on "learning in psychotherapy" did little to resolve or further clarify these issues. For the reader who has followed recent developments in the process of psychotherapy, *The Role of Learning in Psychotherapy* offers a clear summary of the issues and interesting discussions. A limited amount of new information was available. For the reader less well informed as to issues in this area, this book offers an excellent summary of differences which exist between two primary psychotherapeutic positions. *H. Steve Caldwell, Ph.D.*

HERNIA REPAIR WITHOUT DISABILITY. By Irving L. Lichtenstein, M.D. Hard cover, with 113 drawings by Daniel C. Garcia, B.F.A., 210 pp. St. Louis: The C. V. Mosby Company, 1970. $26.50.

This volume on hernia repair is a surgical atlas illustrating the anatomy, technique and physiologic rationale of the "one day" hernia repair. The author states that the text is intended to confront the controversial problems in this field and that polemic concepts and pragmatic answers are presented. The work is essentially a personal report of 627 cases upon which the author has operated and has achieved an almost complete follow-up. The author includes a discussion of femoral and ventral hernias together with chapters on direct and indirect inguinal hernia, sliding inguinal hernia, and recurrent inguinal hernia. A discussion of pediatric hernias is deliberately omitted. Local anesthesia is advocated in preference to general or spinal anesthesia. The repair of indirect inguinal hernias is accomplished by approximation of the transversus abdominis aponeurosis to the inguinal ligament.

There are very good anatomical and operative drawings, some of which are original and others are redrawn from standard anatomy texts and the work of F. H. Netter. The reproduction quality of the drawings is first-rate.

It is difficult to specify the reading audience for which this book is intended as it is intermediate between an atlas, a monograph and a text. Some of the material included, such as the experimental dynamics of wound healing, could have been omitted since it is available in the recent literature. In the sense that this is a personal advocacy in a very controversial field, the book may be of greater or less interest on the library shelf of hospital or institution to surgeons concerned with the repair of hernias. It would not appear to be a text to be recommended as a basic teaching reference to the medical student or surgical resident as the operative steps even for the author's repair require greater detail. The author's recommendation of immediate ambulation from the operating table, and his statement "Throughout the day of surgery he (the patient) is encouraged to walk the equivalent of one to two miles" are striking.

The author includes numerous medical quotations before and after each chapter which are extremely interesting and fascinating. *E. Ide Smith, M.D.*

ESSENTIALS OF CLINICAL ENDOCRINOLOGY. By Norman G. Schneeberg, M.D., Clinical Professor of Medicine (Endocrinology and Metabolism), Hahnemann Medical College and Hospital; Head, Section of Endocrinology (Hahnemann), Philadelphia General Hospital, Philadelphia, Pennsylvania. Cloth, 449 pp. with 210 illustrations and 2 color plates. St. Louis: The C. V. Mosby Company, 1970. $22.50.

The reader of this book should keep in mind the author's purpose, stated in the preface. "No attempt is made to compete with the several available comprehensive endocrine texts; the book is not planned as a reference manual for endocrinologists or as a bibliographic repository. It is designed for the student, the resident, and the practicing physician who are untutored in endocrine matters and who seek a didactic introduction or a brief review of the subject."

The author has admirably met these goals, for this book is packed with pertinent clinical information readily available because of good organization and indexing. Appropriately the author has devoted about one-fourth of the book to thyroid problems and delegated remaining pages to disorders of the pituitary, adrenal cortex and medulla, parathyroids, gonads, carbohydrate metabolism, problems unique to puberty and an introduction to cytogenetics. The book offers many helps in diagnosis. The clinical courses of endocrine disorders are briefly reviewed. Laboratory procedures available to the clinician are described and interpreted with emphasis on factors which may influence their reliability. Steps in performing diagnostic studies are clearly described and enumerated.

Many years of experience and observation are evident in the discussion of therapy. Not only are the pros and cons of various treatment methods presented but their comparative costs as well. Particularly helpful are check lists of concise, specific treatment for endocrine emergencies, such as Addisonian crisis, acute hypercalcemia, and diabetic ketoacidosis.

Ofttimes, however, discussions of theories and areas of controversy are incompletely presented. A bibliography is provided but a few concepts are dated. For practical on-the-ward usage this is a most helpful book but should be used in conjunction with "available comprehensive endocrine texts." *Harriett W. Coussons, M.D.* □

Miscellaneous Advertisements

TWO POSITIONS OPEN for M.D.'s under 55 years of age who wish challenging medical practice with regular hours and minimal night work. Paid vacation and medical meeting plus fringes. Compatible medical staff of eight, working in 40-bed, Joint Commission Accredited Hospital. Attractive college town of 35,000. Robert E. Sinclair, M.D., Lafene Center and University Hospital, Kansas State University, Manhattan, Kansas 66502.

EXCELLENT GENERAL PRACTICE OPPORTUNITY in community which needs several additional physicians. Desire to retire soon. Nearly new clinic for sale or lease; includes laboratory, x-ray, physio-therapy, pharmacy, and necessary space to accommodate two physicians. Contact Russel W. Lewis, M.D., 1901 West Broadway, Sulphur, Oklahoma 73086.

ELECTROENCEPHLOGRAPHIC MACHINE owned by retiring neurosurgeon. Designed by Doctor Offner. All transitor—eight channels. Needs little maintenance. Portable. Robert Hewitt, 1225 N.W. 17th, Oklahoma City 73106. Telephone 524-8241.

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GENERAL SURGEON SEEKS practice opportunity in Oklahoma. Licensed in Pennsylvania and New York, eligible in Oklahoma. Eligible, American Board of Surgery. Desires location with emphasis on surgery, but will do limited general practice. Contact Key S, The Journal, Oklahoma State Medical Association, 601 N.W. Expressway, Oklahoma City, Oklahoma 73118.

MEDICAL STUDENT DESIRES Oklahoma City employment in physician's office, part time until July, then full time through summer; practical work experience in OU Family Practice Clinic, histories, hematocrits, urinalyses, emergency room; 45 graduate hours in anatomy. Contact Jimmy Martin, 3404 Eastwood Drive, Oklahoma City 73115. Telephone 677-6077.

GENERAL PRACTITIONERS—Have you been thinking about taking a residency? Some of our best residents come from your ranks. We have openings in approved three-year internal medicine, four-year general surgery, and four-year pathology programs. Contact F. H. McGregor, M.D., Director of Medical Education, Baptist Memorial Hospital, 5800 N.W. Grand Boulevard, Oklahoma City, Oklahoma 73112. Phone 405 946-6411.

NORTHWEST TEXAS COMMUNITY needs general surgeon or general practitioner. 6,000 population with 12,000 drawing population from agricultural area. Fifty miles to Wichita Falls and 70 miles to Fort Worth. New 53-bed general hospital. Contact Bowie Clinic, P.O. Box 681, Bowie, Texas. Call collect 817, 872-1121.

PHYSICIAN, GENERAL or PSYCHIATRIC, previous experience. Earn $18,000 and up, with fully furnished house. Modernized State Hospital. Ample opportunities for hunting, shooting, fishing and other recreation. Personal visit welcomed. Send curriculum vitae to Western State Hospital, Fort Supply, Oklahoma 73841. □

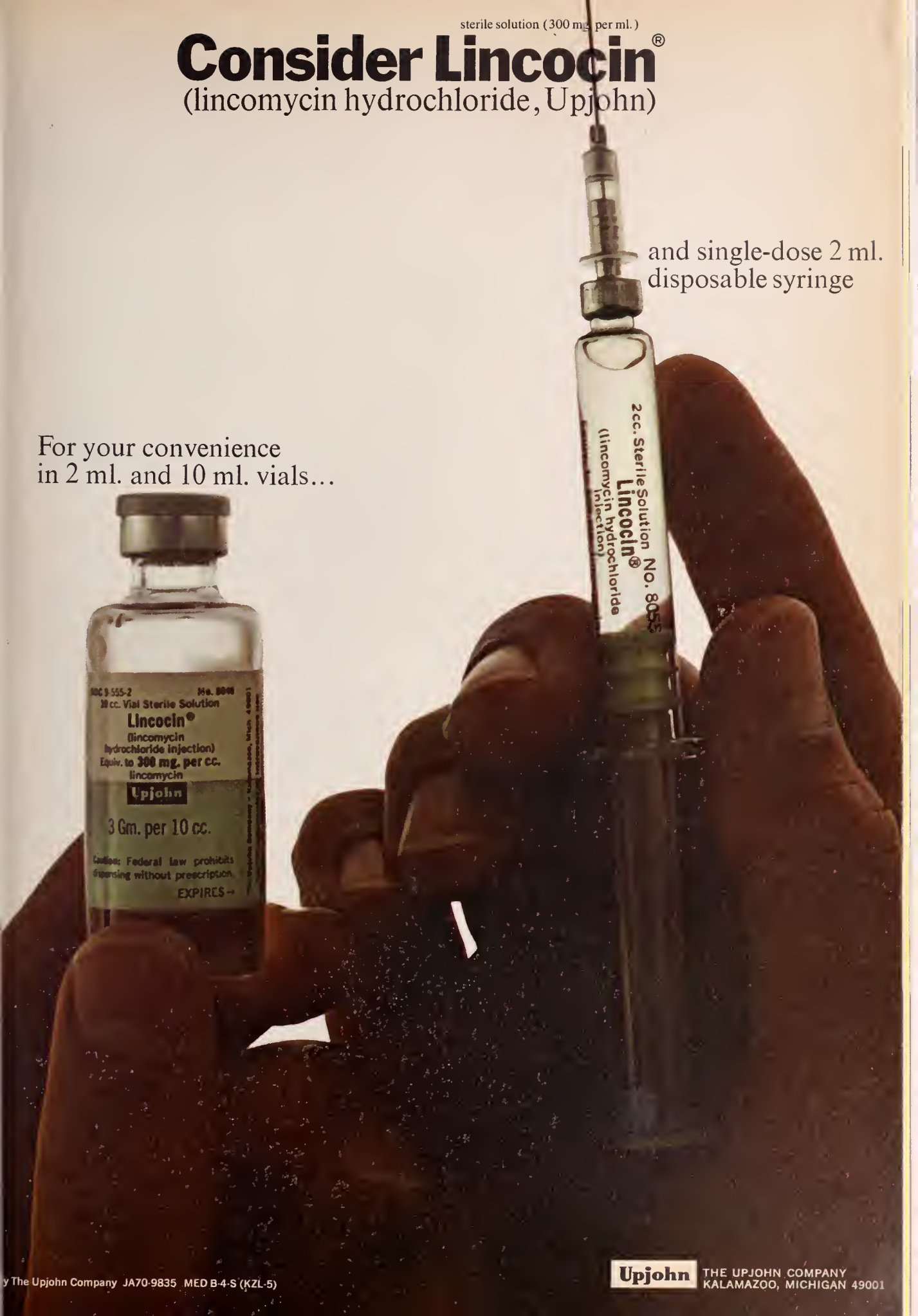
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1. Duvoisin, R. C.; Yahr, M.D., and Coté, L. D.: *Trans. Amer. Neurol. Assoc., 94*:81, 1969.
2. Cotzias, G. C.: *J.A.M.A., 210*:1255, 1969.

Complete Prescribing Information:
Each Larobec tablet contains:
Thiamine mononitrate (vitamin B_1) 15 mg
Riboflavin (vitamin B_2) ..... 15 mg
Niacinamide .....100 mg
Calcium pantothenate ..... 20 mg
Cyanocobalamin (vitamin B_{12}) ... 5 mcg
Folic acid ..... 0.5 mg
Ascorbic acid (vitamin C) .....500 mg

Description: For prophylactic or therapeutic nutritional supplementation concomitant with levodopa therapy in patients with Parkinson's disease and syndrome, Larobec provides high potency dosages of the major B-complex vitamins, without pyridoxine (vitamin B_6) which has been reported[1,2] to reduce the clinical benefits of levodopa therapy. B-complex vitamins are essential in the anabolism of carbohydrate and protein and in hematopoiesis. Larobec also contains therapeutic quantities of ascorbic acid, a substance involved in intracellular reactions such as tissue repair and collagen formation.

Indications: Larobec is indicated for supportive nutritional supplementation when a water-soluble vitamin formula (without pyridoxine) is required prophylactically or therapeutically in patients under treatment with levodopa.

Warning: Administration of vitamin B_6 may be required if signs of pyridoxine deficiency develop. Larobec is not intended for treatment of pernicious anemia or other primary or secondary anemias. Neurologic involvement may develop or progress, despite temporary remission of anemia, in patients with pernicious anemia who receive more than 0.1 mg of folic acid per day and who are inadequately treated with vitamin B_{12}.

Dosage and Administration: One or two tablets daily, as indicated by clinical need.

How Supplied: Orange-colored, capsule-shaped tablets, imprinted Roche 73; bottles of 100.

References:
1. Duvoisin, R. C., *et al.*: *Trans. Amer. Neurol. Assoc., 94*: 81, 1969.
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NOTE: Not recommended during the acute recovery phase following myocardial infarction. Patients with cardiovascular disorders should be watched closely; arrhythmias, sinus tachycardia, and prolongation of the conduction time have been reported, particularly with high doses; myocardial infarction and stroke have been reported with drugs of this class. Close supervision is required for hyperthyroid patients or those receiving thyroid medication. Concurrent electroshock therapy may increase the hazards of therapy; such treatment should be limited to patients for whom it is essential. Discontinue the drug several days before elective surgery if possible.

Contraindications: Known hypersensitivity. Should not be given concomitantly with or within at least 14 days following the discontinuance of a monoamine oxidase inhibitor. Then initiate dosage of amitriptyline HCl cautiously with gradual increase in dosage until optimum response is achieved. Not recommended during the acute recovery phase following myocardial infarction or for patients under 12 years of age.
Warnings: May block the antihypertensive action of guanethidine or similarly acting compounds. Should be used with caution in patients with a history of seizures or urinary retention, or with narrow-angle glaucoma or increased intraocular pressure. Patients with cardiovascular disorders should be watched closely; arrhythmias, sinus tachycardia, and prolongation of the conduction time have been reported, particularly with high doses; myocardial infarction and stroke have been reported with drugs of this class. Close supervision is required for hyperthyroid patients or those receiving thyroid medication. May impair mental and/or physical abilities required for performance of hazardous tasks, such as operating machinery or driving a motor vehicle. Safe use during pregnancy and lactation has not been established; in pregnant patients, nursing mothers, or women who may become pregnant, weigh possible benefits against possible hazards to mother and child.
Precautions: When used to treat the depressive component of schizophrenia, psychotic symptoms may be aggravated; in manic-depressive psychosis, depressed patients may experience a shift toward the manic phase, and paranoid delusions, with or without associated hostility, may be exaggerated; in any of these circumstances, it may be advisable to reduce the dose of amitriptyline HCl, or to use a major tranquilizing drug, such as perphenazine, concurrently. When given with anticholinergic agents or sympathomimetic drugs, close supervision and careful adjustment of dosages are required. May enhance the response to alcohol and the effects of barbiturates and other CNS depressants. The possibility of suicide in depressed patients remains during treatment and until significant remission occurs; this type of patient should not have easy access to large quantities of the drug. Concurrent electroshock therapy may increase the hazards of therapy; such treatment should be limited to patients for whom it is essential. Discontinue the drug several days before elective surgery if possible.
Adverse Reactions: *Note:* Included in this listing are a few adverse reactions not reported with this specific drug. However, pharmacological similarities among the tricyclic antidepressant drugs require that each reaction be considered when amitriptyline is administered.
Cardiovascular: Hypotension, hypertension, tachycardia, palpitation, myocardial infarction, arrhythmias, heart block, stroke. *CNS and Neuromuscular:* Confusional states; disturbed concentration; disorientation; delusions; hallucinations; excitement; anxiety; restlessness; insomnia; nightmares; numbness, tingling, and paresthesias of the extremities; peripheral neuropathy; incoordination; ataxia; tremors; seizures; alteration in EEG patterns; extrapyramidal symptoms. *Anticholinergic:* Dry mouth, blurred vision, disturbance of accommodation, constipation, paralytic ileus, urinary retention, dilatation of urinary tract. *Allergic:* Skin rash, urticaria, photosensitization, edema of face and tongue. *Hematologic:* Bone marrow depression including agranulocytosis, eosinophilia, purpura, thrombocytopenia. *Gastrointestinal:* Nausea, epigastric distress, vomiting, anorexia, stomatitis, peculiar taste, diarrhea, parotid swelling. *Endocrine:* Testicular swelling and gynecomastia in the male, breast enlargement and galactorrhea in the female, increased or decreased libido. *Other:* Dizziness, weakness, fatigue, headache, weight gain or loss, increased perspiration, urinary frequency, mydriasis, drowsiness, jaundice. *Withdrawal Symptoms:* Abrupt cessation of treatment after prolonged administration may produce nausea, headache, and malaise; these are not indicative of addiction.
How Supplied: Tablets containing 10 mg and 25 mg amitriptyline HCl, in single-unit packages of 100 and bottles of 100, 1000, and 5000; tablets containing 50 mg amitriptyline HCl, in single-unit packages of 100 and bottles of 100 and 1000; for intramuscular use, in 10-cc vials containing per cc: 10 mg amitriptyline HCl, 44 mg dextrose, and 1.5 mg methylparaben and 0.2 mg propylparaben as preservatives.
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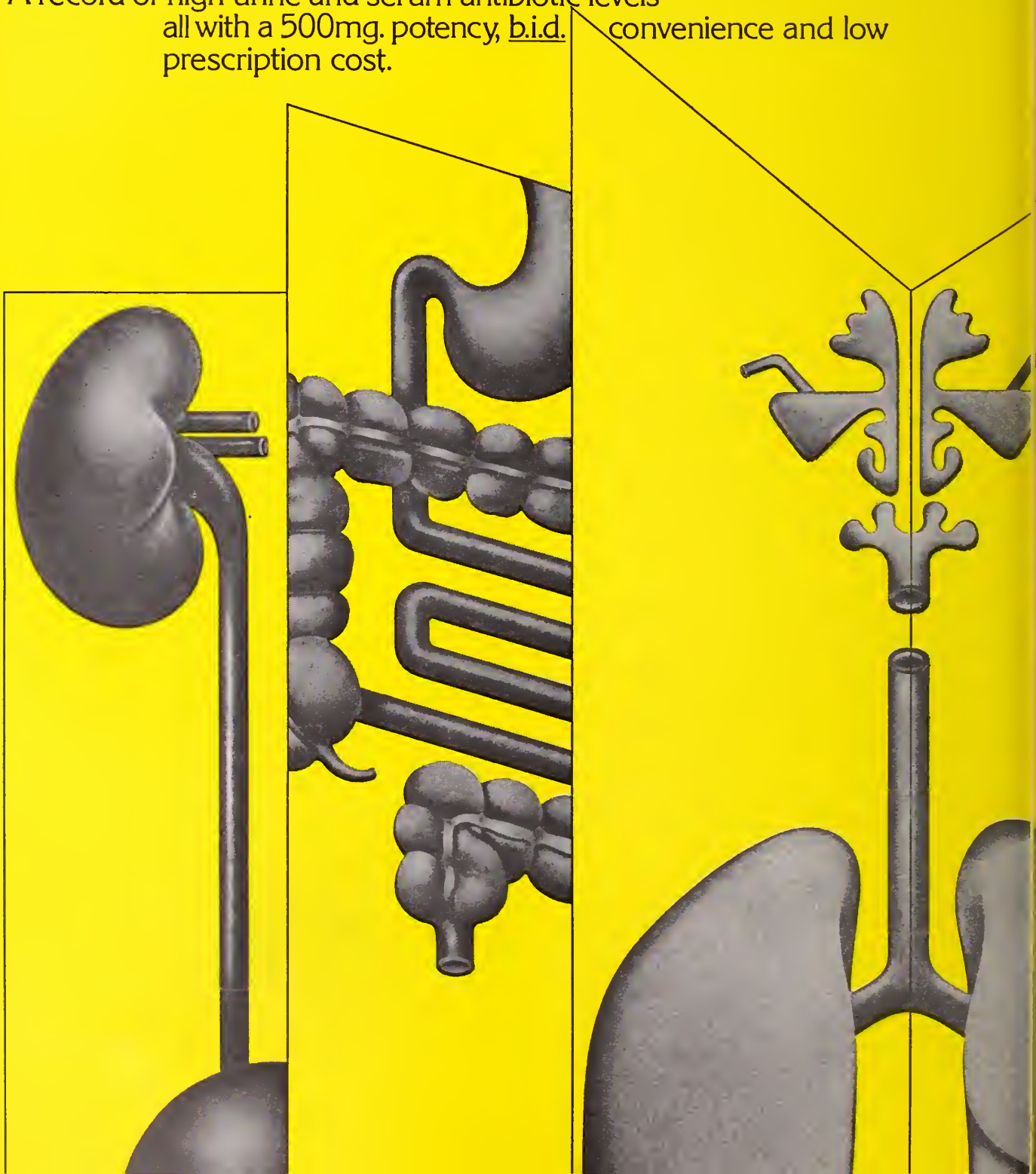
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Precautions: Mycotic or bacterial superinfections may occur. Infants may develop increased intracranial pressure with bulging fontanels. Cases of gonorrhea with a suspected primary lesion of syphilis should have darkfield examinations before receiving treatment. In all other cases where concomitant syphilis is suspected, monthly serological tests should be performed for a minimum of 4 months.

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All physicians are invited to attend this important seminar. A $10 registration fee will be charged to cover the cost of dinner and meeting expenses. Wives are invited also.

Physicians wishing to attend this meeting should make advanced reservations by writing to OSMA Drug Abuse Committee, 601 N.W. Expressway, Oklahoma City, Oklahoma 73118. A check for the proper amount of registration fee should be enclosed.

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Enrollment in the course is limited by available clinical facilities. The total fee is $100.00. Applicants will be accepted for enrollment primarily on the basis of the sequence of arrival of the completed application forms, which may be ordered from the Department of Anesthesiology at the medical center. Registration forms must be submitted with a deposit of $25.00 (refundable prior to April 1st). Remainder of the tuition ($75.00) must be submitted by March 24th.

This course is limited in enrollment to physicians who are not specialists in anesthesiology but whose practice currently includes the administration of anesthesia.

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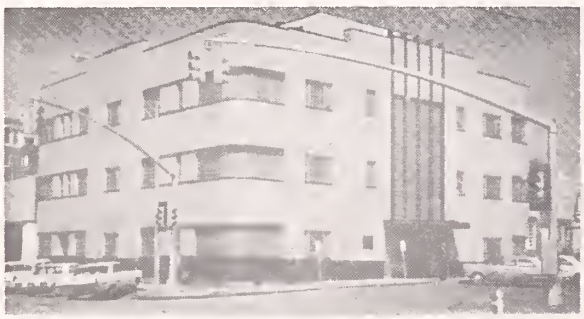
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The JOURNAL *of the Oklahoma State Medical Association*

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June Issue

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Articles accepted for publication, including manuscripts of annual meeting papers, are the sole property of *The Journal* and must not have been published elsewhere. Authority for approval of all contributions rests with the Editorial Board, and the Board reserves the right to edit any material submitted. Manuscripts should be typewritten, double spaced and submitted in original and one copy. Receipt of manuscripts will be acknowledged and unused manuscripts returned. Used manuscripts will be returned on request. *The Journal of the Oklahoma State Medical Association* is not responsible for the statements or opinions of any contributor.

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Members of the Oklahoma State Medical Association, the constituent societies of the association, and all readers in general are invited to supply news items of general interest to the profession.

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BACK ISSUES

Microfilm copies of back issues of *The Journal* may now be purchased from University Microfilms, 300 North Zeeb Road, Ann Arbor, Michigan 48106.

Social Security Numbers are now being required by all insurance companies before they can make a payment to a physician or dentist. The companies are now being required by the Internal Revenue Service to file an information return on any physician that is paid an aggregate of $600 or more during any calendar year. An explanation of the IRS regulation is carried on page 67 of this issue of *The Journal.*

A Louisiana law barring chiropractors from practicing in that state has been upheld by the United States Supreme Court. The court rejected an appeal brought by a chiropractor who maintained that his constitutional right to pursue "an accepted profession" has been violated. In declining to review the constitutionality of the law, the Supreme Court ruled that the Louisiana statute properly uses state powers to protect health. Louisiana is the only state requiring chiropractors to meet the same standards of medical education and training as physicians. The Supreme court upheld this principle in a 1966 decision.

Oklahoma's Medicaid Program expended nearly $85 million between July 1, 1969 and June 30, 1970. Administered by the State Department of Institutions, Social and Rehabilitative Services (Department of Public Welfare), the program is financed 68 percent by federal funds and 32 percent by state sales tax revenues. Oklahoma physicians received $13.2 million of the total and hospitals received $17.7 million. Nursing homes received 55 percent of the health funds for a total of $41.9 million.

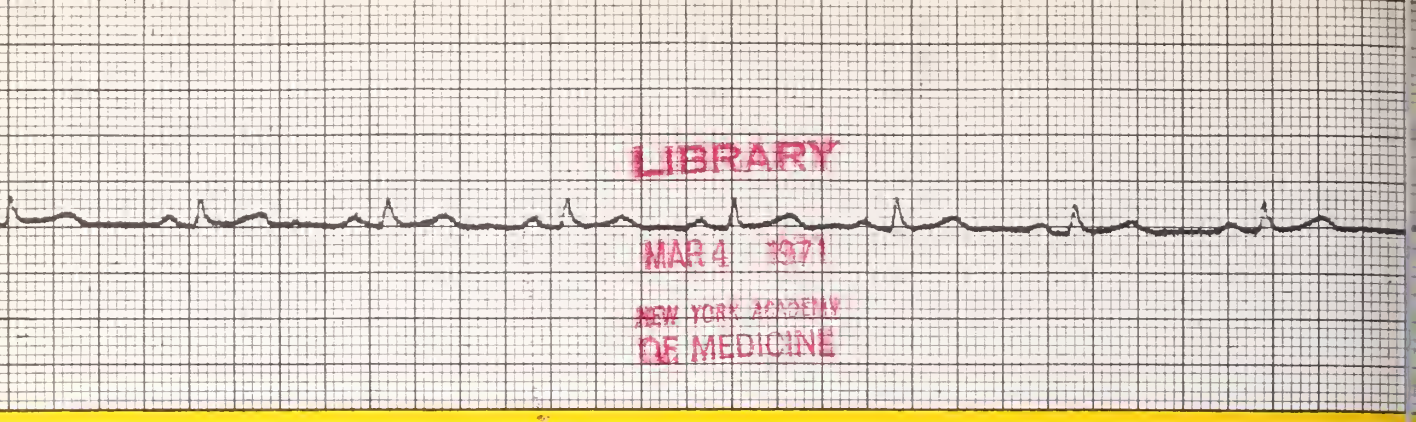
The U. S. gained 9,102 M.D.'s during 1970 according to the preliminary physician supply tabulations from the AMA's Center for Health Services Research and Development. At the end of last year, the nation's total physician population — excluding M.D.'s classified as "temporarily foreign"—was 334,044. Figures showed that the total physician population had increased by 17,012 since December 31, 1968. Total number of physicians engaged in patient care was 278,535.

OSMA JOURNAL/*the last word*

Missouri M.D.'s and D.O.'s have joined to establish a health care foundation of Missouri that will review services performed by both professions. Under the unique mechanism, established by the Missouri State Medical Association and the Missouri Association of Osteopathic Physicians and Surgeons, five regional panels will review cases involving questionable fees, quality of service and utilization. Cases will be referred by physicians, third party carriers or through formal grievances lodged by patients. Major purposes of the foundation's review system will be to implement or expand continuing education programs and to review appropriateness of medical care.

Oklahoma is now one of only ten states that require mandatory AMA membership in order to belong to the state society. Three states recently dropped the requirement. The ten states still requiring AMA membership are Arizona, California, Colorado, Hawaii, Illinois, Kansas, Mississippi, Nebraska, Wisconsin and Oklahoma.

Bitterly denouncing "the hoax perpetrated on the elderly," the American Nursing Home Association withdrew its official support of the Medicare program for extended care and urged the more than 7,000 nursing homes to follow suit. Commenting on the action, taken at the midwinter meeting of ANHA's board, President David Mosher said: "The tragic aspect of the Medicare program for extended care is that the Social Security Administration led America's senior citizens to believe that—if their physician thought it necessary—they were entitled to 100 days of extended care at government expense. Subsequent rules and regulations issued by SSA have virtually ruled this out." Congressional intent to provide extended care services as "a less costly alternative to hospital inpatient services" has been almost completely negated by administration of the program, an ANHA resolution stated. □


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Volume 64 — Number 3 — March 1971

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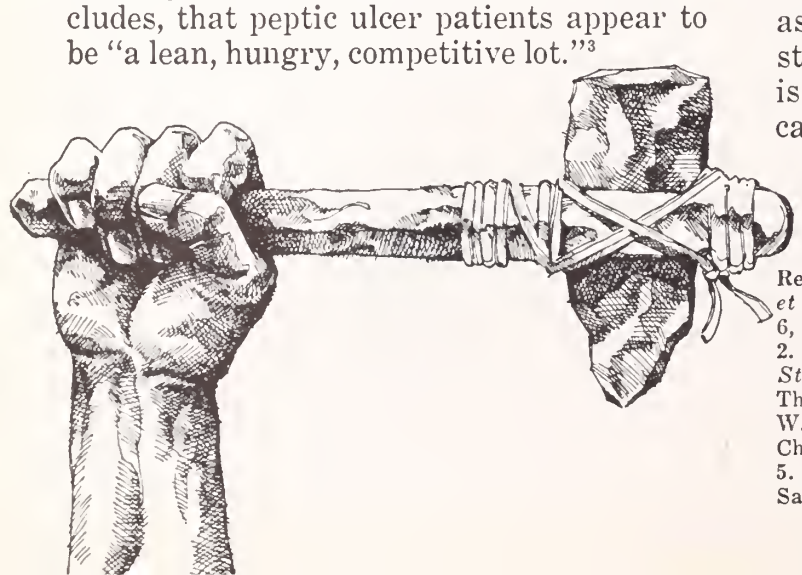
IF MORE MEN CRIED



At least seventy-five out of one hundred adults with duodenal ulcers are men.[1] Why? It may be significant that duodenal ulcer patients tend to crave recognition and are "especially vulnerable to threats to their manly assertive independence."[2]

Hypersecretion—an atavistic response. Stewart Wolf, who, with Harold G. Wolff, studied the personalities of duodenal ulcer patients, wonders if masculine competitiveness is related to "an atavistic urge to devour an adversary." It is striking, he reports, that an accentuation of gastric acid secretion and motility can be "induced in ulcer patients by discussions that arouse feelings of inadequacy, frustration and resentment."[2]

By chance? A lean, hungry lot. Was the link between emotions and gastric hyperacidity acquired through mutation to serve a purpose? During man's jungle period of evolution, the investigator points out, a male dealt with a foe by killing and devouring it. "It may be more than coincidence," he concludes, that peptic ulcer patients appear to be "a lean, hungry, competitive lot."[3]



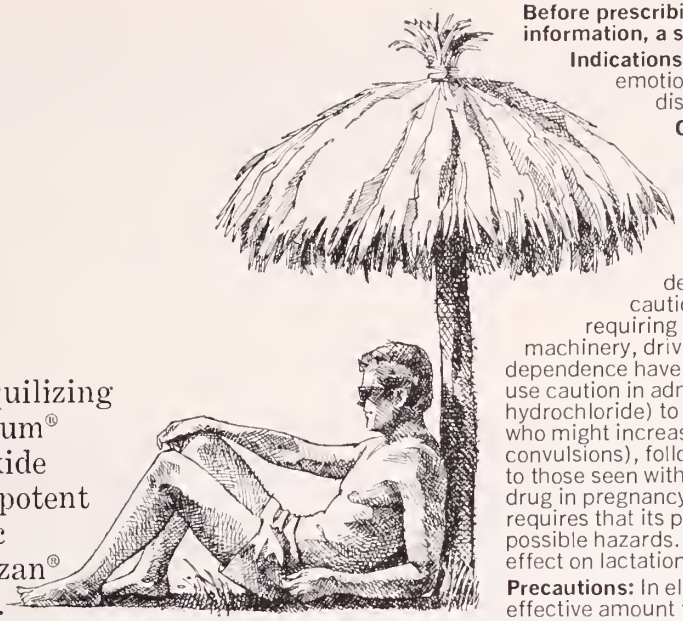
Big boys don't cry. If more men cried, maybe fewer would wind up with duodenal ulcers. But men will be men—the sum total of their genes and what they are taught. Schottstaedt observes that when a mother admonishes her son who has hurt himself that big boys don't cry, she is teaching him stoicism.[4] Crying is the negation of everything society thinks of as manly. A boy starts defending his manhood at an early age.



Take away stress you can take away symptoms. There is no question that stress plays a role in the etiology of duodenal ulcer. Alvarez[5] observes that many a man with an ulcer loses his symptoms the day he shuts up the office and starts out on a vacation. The problem is, the type of man likely to have an ulcer is the type least likely to take long vacations or take it easy at work.

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References: 1. Silen, W.: "Peptic Ulcer," in Wintrobe, M. M. *et al.* (eds.): *Harrison's Principles of Internal Medicine*, ed. 6, New York, McGraw-Hill Book Company, 1970, p. 144. 2. Wolf, S., and Goodell, H. (eds.): *Harold G. Wolff's Stress and Disease*, ed. 2, Springfield, Ill., Charles C. Thomas, 1968, pp. 68-69. 3. *Ibid.*, p. 257. 4. Schottstaedt, W. W.: *Psychophysiologic Approach in Medical Practice*, Chicago, Ill., The Year Book Publishers, Inc., 1960, p. 163. 5. Alvarez, W. C.: *The Neuroses*, Philadelphia, Pa., W. B. Saunders Company, 1951, p. 384.

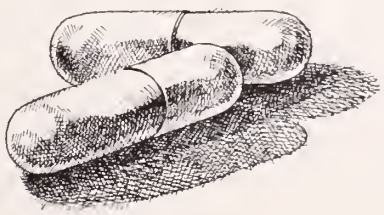


bines the tranquilizing action of Librium® (chlordiazepoxide HCl) with the potent anticholinergic action of Quarzan® (clidinium Br).

Protects man from his own hungry personality. The action of Librium reduces anxiety—helps protect the vulnerable patient from the psychological overreaction to stress that clutches his stomach. At the same time, the action of Quarzan helps quiet the hyperactive gut, decreasing hypermotility and hypersecretion.

An inner healing environment with 1 or 2 capsules, 3 or 4 times daily. Of course, there's more to the treatment of duodenal ulcer than a prescription for Librax. The patient—with your guidance—will have to adjust to a different pattern of living if treatment is to succeed. During this adjustment period, 1 or 2 capsules of Librax 3 or 4 times daily can help establish a desirable environment for healing.

Librax: It can't change man's nature. But it can usually make it easier for men to cope with the discomfort of stress—both psychic and gastric—that can precipitate and exacerbate duodenal ulcer.
Librax: Rx #60 1 cap. *a.c.* and 2 *h.s.*



Before prescribing, please consult complete product information, a summary of which follows:

Indications: Indicated as adjunctive therapy to control emotional and somatic factors in gastrointestinal disorders.

Contraindications: Patients with glaucoma; prostatic hypertrophy and benign bladder neck obstruction; known hypersensitivity to chlordiazepoxide hydrochloride and/or clidinium bromide.

Warnings: Caution patients about possible combined effects with alcohol and other CNS depressants. As with all CNS-acting drugs, caution patients against hazardous occupations requiring complete mental alertness (*e.g.*, operating machinery, driving). Though physical and psychological dependence have rarely been reported on recommended doses, use caution in administering Librium (chlordiazepoxide hydrochloride) to known addiction-prone individuals or those who might increase dosage; withdrawal symptoms (including convulsions), following discontinuation of the drug and similar to those seen with barbiturates, have been reported. Use of any drug in pregnancy, lactation, or in women of childbearing age requires that its potential benefits be weighed against its possible hazards. As with all anticholinergic drugs, an inhibiting effect on lactation may occur.

Precautions: In elderly and debilitated, limit dosage to smallest effective amount to preclude development of ataxia, oversedation or confusion (not more than two capsules per day initially; increase gradually as needed and tolerated). Though generally not recommended, if combination therapy with other psychotropics seems indicated, carefully consider individual pharmacologic effects, particularly in use of potentiating drugs such as MAO inhibitors and phenothiazines. Observe usual precautions in presence of impaired renal or hepatic function. Paradoxical reactions (*e.g.*, excitement, stimulation and acute rage) have been reported in psychiatric patients. Employ usual precautions in treatment of anxiety states with evidence of impending depression; suicidal tendencies may be present and protective measures necessary. Variable effects on blood coagulation have been reported very rarely in patients receiving the drug and oral anticoagulants; causal relationship has not been established clinically.

Adverse Reactions: No side effects or manifestations not seen with either compound alone have been reported with Librax. When chlordiazepoxide hydrochloride is used alone, drowsiness, ataxia and confusion may occur, especially in the elderly and debilitated. These are reversible in most instances by proper dosage adjustment, but are also occasionally observed at the lower dosage ranges. In a few instances syncope has been reported. Also encountered are isolated instances of skin eruptions, edema, minor menstrual irregularities, nausea and constipation, extrapyramidal symptoms, increased and decreased libido—all infrequent and generally controlled with dosage reduction; changes in EEG patterns (low-voltage fast activity) may appear during and after treatment; blood dyscrasias (including agranulocytosis), jaundice and hepatic dysfunction have been reported occasionally with chlordiazepoxide hydrochloride, making periodic blood counts and liver function tests advisable during protracted therapy. Adverse effects reported with Librax are typical of anticholinergic agents, *i.e.*, dryness of mouth, blurring of vision, urinary hesitancy and constipation. Constipation has occurred most often when Librax therapy is combined with other spasmolytics and/or low residue diets.

in the treatment of duodenal ulcer adjunctive

Librax®

Each capsule contains 5 mg chlordiazepoxide HCl and 2.5 mg clidinium Br.

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Division of Hoffmann-La Roche Inc.
Nutley, N.J. 07110

Short-acting diuretics may create abrupt, inconvenient waves of diuresis.
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In edema and hypertension.

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Makes water, not waves.

You know diuretics medically.



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Hygroton® chlorthalidone USP *Indications:* Hypertension and many types of edema involving retention of salt and water. *Contraindications:* Hypersensitivity and most cases of severe renal or hepatic diseases. *Warnings:* With the administration of enteric-coated potassium supplements, which should be used only when adequate dietary supplementation is not practical, the possibility of small-bowel lesions (obstruction, hemorrhage, and perforation) should be kept in mind. Surgery for these lesions has been required frequently and deaths have occurred. Discontinue enteric-coated potassium supplements immediately if abdominal pain, distention, nausea, vomiting, or gastrointestinal bleeding occur. Use with caution in pregnant women and nursing mothers since the drug crosses the placental barrier and appears in cord blood and since thiazides appear in breast milk. The drug may result in fetal or neonatal jaundice, thrombocytopenia, and possibly other adverse reactions which have occurred in the adult. When used in women of childbearing age, balance benefits of drug against possible hazards to fetus. *Precautions:* Antihypertensive therapy with this drug should always be initiated cautiously in postsympathectomy patients and in patients receiving ganglionic blocking agents, other potent antihypertensive drugs or curare. Reduce dosage of concomitant antihypertensive agents by at least one-half. Because of the possibility of progression of renal damage, periodic determination of the BUN is indicated. Discontinue if the BUN rises or liver dysfunction is aggravated. Hepatic coma may be precipitated. Electrolyte imbalance, sodium and/or potassium depletion may occur. If potassium depletion should occur during therapy, the drug should be discontinued and potassium supplements given, provided the patient does not have marked oliguria. Take special care in cirrhosis or severe ischemic heart disease and in patients receiving corticosteroids, ACTH, or digitalis. Salt restriction is not recommended. *Adverse Reactions:* Nausea, gastric irritation, vomiting, anorexia, constipation and cramping, dizziness, weakness, restlessness, hyperglycemia, glycosuria, hyperuricemia, headache, muscle cramps, orthostatic hypotension, which may be potentiated when chlorthalidone is combined with barbiturates, narcotics or alcohol, aplastic anemia, leukopenia, thrombocytopenia, agranulocytosis, impotence, dysuria, transient myopia, skin rashes, urticaria, purpura, necrotizing angiitis, acute gout, and pancreatitis when epigastric pain or unexplained G.I. symptoms develop after prolonged administration. Other reactions reported with this class of compounds include: jaundice, xanthopsia, paresthesia, and photosensitization. *Average Dosage:* 50 or 100 mg. with breakfast daily or 100 mg. every other day. *How Supplied:* White, single-scored tablets of 100 mg. and aqua tablets of 50 mg., in bottles of 100 and 1000. (B)46-230-G *For full details, please see the complete prescribing information.*

GEIGY Pharmaceuticals, Division of CIBA-GEIGY Corporation, Ardsley, New York 10502

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1971
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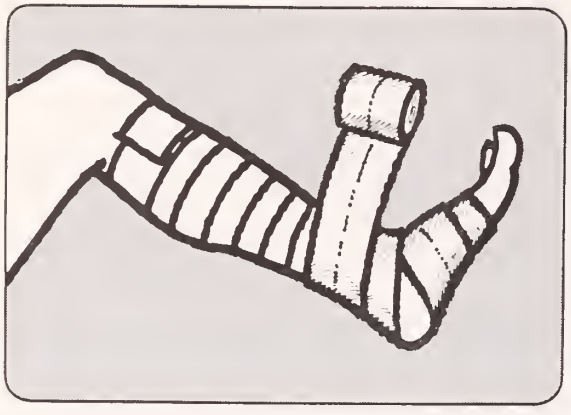
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Address .....

City .....

State ..... Zip .....

Brief Summary of Prescribing Information– 9-9/22/69. For complete information consult Official Package Circular.
Indications: Essential hypertension. Use cautiously in patients with renal insufficiency, particularly if they are digitalized.
Contraindications: Anuria, oliguria, active peptic ulceration, ulcerative colitis, severe depression or hypersensitivity to its components contraindicates the use of Salutensin.
Warnings: Small-bowel lesions (obstruction, hemorrhage, perforation and death) have occurred during therapy with enteric-coated formulations containing potassium, with or without thiazides. Such potassium formulations should be used with Salutensin only when indicated and should be discontinued immediately if abdominal pain, distension, nausea, vomiting or gastrointestinal bleeding occurs. Use cautiously, and only when deemed essential, in fertile, pregnant or lactating patients. *Use in Pregnancy:* Thiazides cross the placenta and can cause fetal or neonatal hyperbilirubinemia, thrombocytopenia, altered carbohydrate metabolism and possibly electrolyte disturbances. Fatal reactions may occur with reserpine during electroshock therapy; discontinue Salutensin 2 weeks before such therapy. Increased respiratory secretions, nasal congestion, cyanosis and anorexia may occur in infants born to reserpine-treated mothers.
Precautions: Azotemia, hypochloremia, hyponatremia, hypochloremic alkalosis and hypokaliemia (especially with hepatic cirrhosis and corticosteroid therapy) may occur, particularly with pre-existing vomiting and diarrhea. Potassium loss or protoveratrine A may cause digitalis intoxication. *Potassium loss responds to potassium-rich foods, potassium chloride or, if necessary, discontinuation of therapy. Stop therapy if protoveratrine A induces digitalis intoxication.* Serum ammonia elevation may precipitate coma in precomatose hepatic cirrhotics. Discontinue therapy 2 weeks before surgery or if myocardial irritability, progressive azotemia or severe depression occur. Exercise caution in patients with chronic uremia, angina pectoris, coronary thrombosis or extensive cerebral vascular disease *or bronchial asthma* and in those with a history of peptic ulceration or bronchial asthma; in post-sympathectomy patients; in patients on quinidine; and in patients with gallstones, in whom biliary colic may occur. Patients who have diabetes mellitus or who are suspected of being prediabetic should be kept under close observation if treated with this agent.
Adverse Reactions: Hydroflumethiazide: Skin rashes (including exfoliative dermatitis), skin photosensitivity, urticaria, necrotizing angiitis, xanthopsia, granulocytopenia, aplastic anemia, orthostatic hypotension (potentiated with alcohol, barbiturates or narcotics), allergic glomerulonephritis, acute pancreatitis, liver involvement (intrahepatic cholestatic jaundice), purpura plus or minus thrombocytopenia, hyperuricemia, hyperglycemia, glycosuria, malaise, weakness, dizziness, fatigue, paresthesias, muscle cramps, skin rash, epigastric distress, vomiting, diarrhea and constipation. *Reserpine:* Depression, peptic ulceration, diarrhea, Parkinsonism, nasal stuffiness, dryness of the mouth, weight gain, impotence or decreased libido, conjunctival injection, dull sensorium, deafness, glaucoma, uveitis, optic atrophy, and, with overdosage, agitation, insomnia and nightmares. *Protoveratrine A:* Nausea, vomiting, cardiac arrhythmia, prostration, blurring vision, mental confusion, excessive hypotension and bradycardia. (Treat bradycardia with atropine and hypotension with vasopressors.)
Usual Dose: 1 tablet b.i.d.
Supplied: Bottles of 60, 600, and 1000 scored 50 mg. tablets.

Salutensin®

hydroflumethiazide, 50 mg./reserpine, 0.125 mg. protoveratrine A, 0.2 mg.

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Syracuse, New York 13201

The antihypertensive therapy that is easy to live with.*

When successive blood pressure readings confirm essential hypertension, consider Salutensin for:

Easy-to-live-with control. Gradual reduction of blood pressure leading to decisive, comfortable control is the common clinical response.

*Salutensin is usually well-tolerated (however, serious side effects can occur; see adjacent column for brief summary of prescribing information).

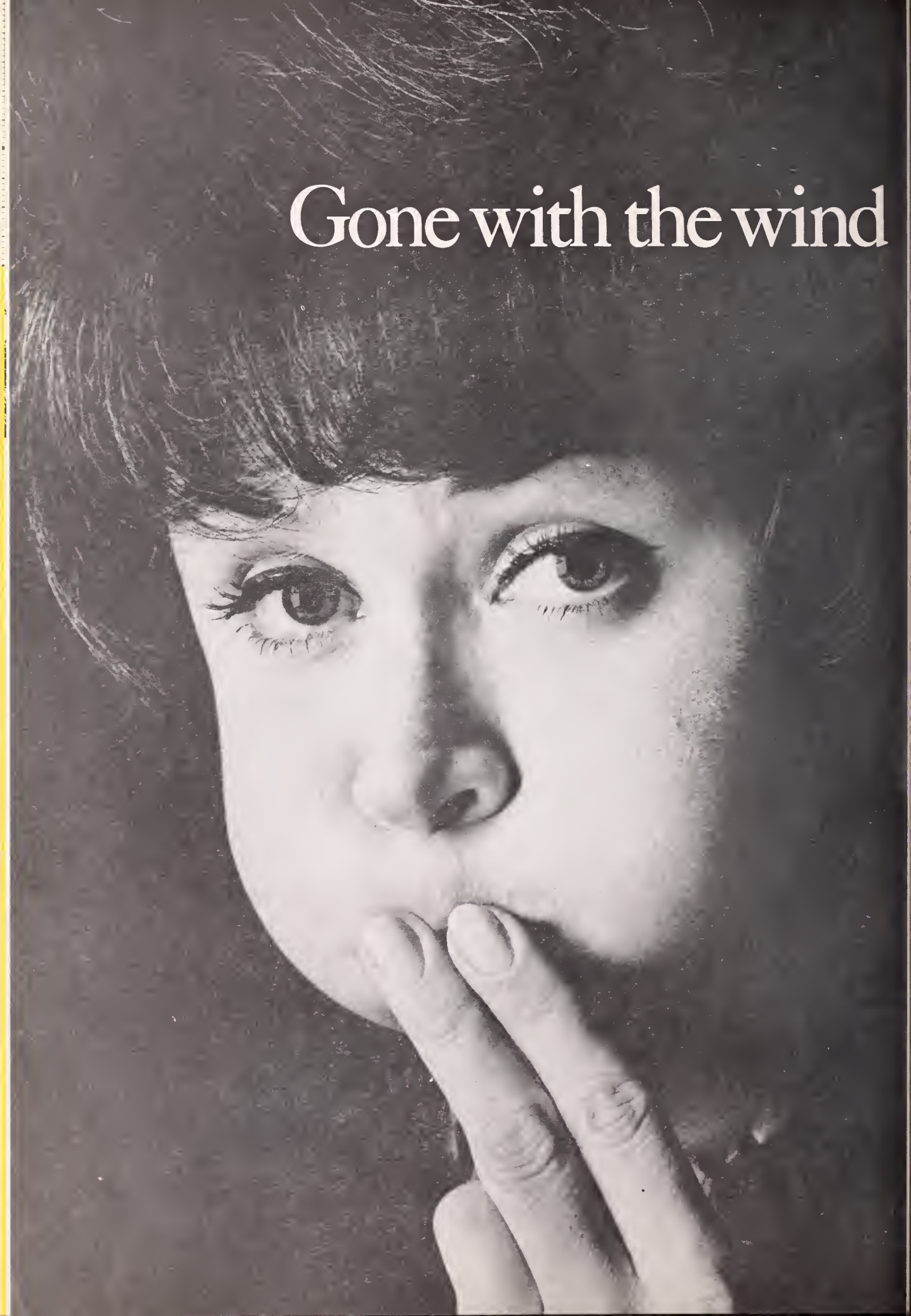
Easy-to-live with dosage. Two tablets a day usually achieves control. One to two tablets a day often maintains control without need for additional antihypertensive agents.

Easy-to-live with cost of therapy. The one to two tablets a day maintenance dose makes Salutensin economical to stay with. Important, because long-term control calls for long-term therapy.

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hydroflumethiazide, 50 mg./reserpine, 0.125 mg. protoveratrine A, 0.2 mg.




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"The two most common complaints referable to the upper gastrointestinal tract for which patients seek medical relief are hyperacidity and 'gas.' The two often occur together."*

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*Slanger, A.: Med. Times *94*:150 (Feb.) 1966.

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Tablets: simethicone plus aluminum hydroxide/magnesium carbonate co-dried gel and magnesium hydroxide

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one dose does both: frees captured gas...neutralizes free acid

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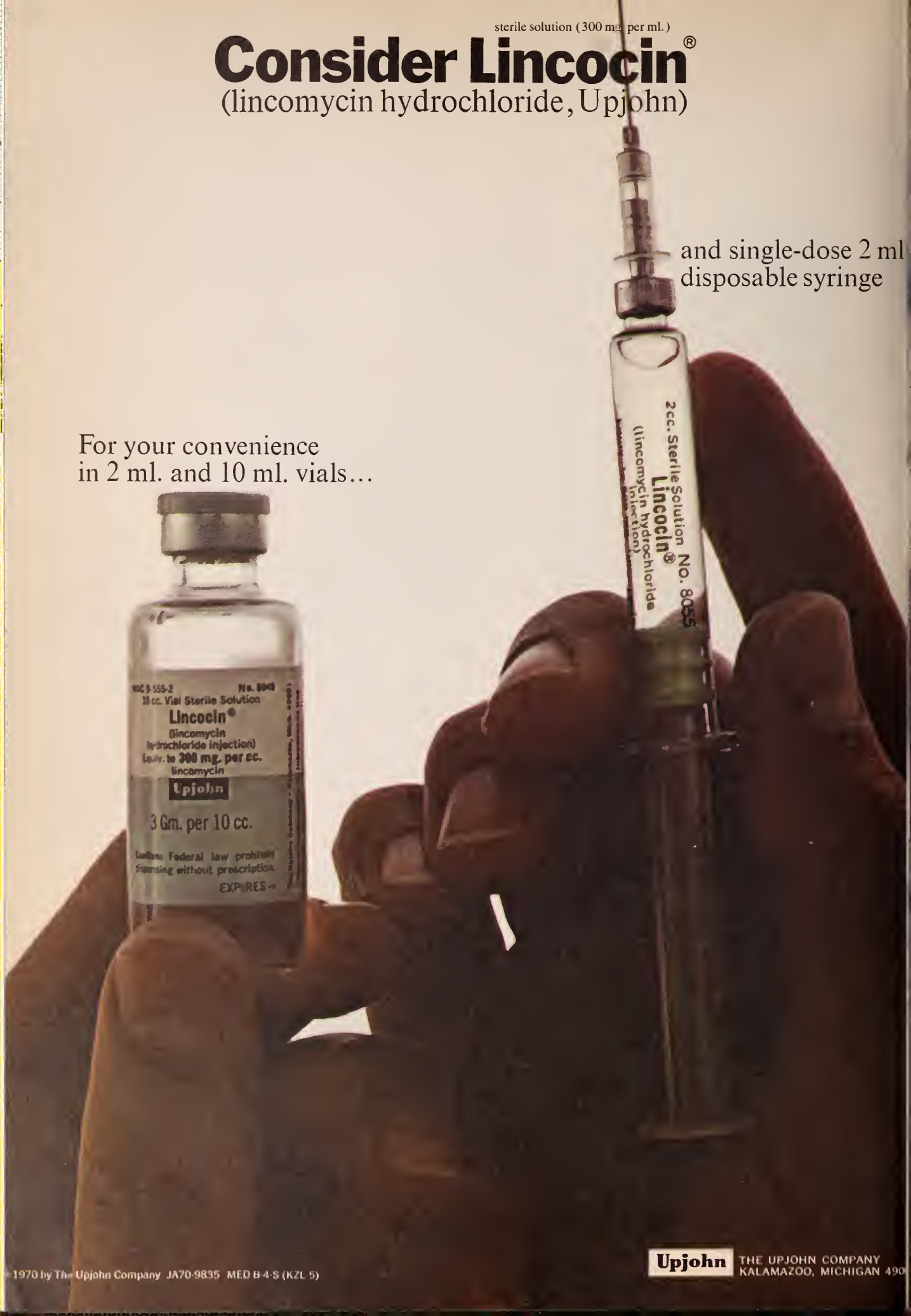
sterile solution (300 mg. per ml.)

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and single-dose 2 ml
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in 2 ml. and 10 ml. vials...



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A once-popular treatment for back pains was to have the seventh son of a seventh son stand or walk on the patient's back.





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keeps the promise of pain relief

'B.W. & Co.' narcotic products are Class "B", and as such are available on oral prescription, where State law permits.

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TABLETS

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Thiamine mononitrate (vitamin B_1)	15 mg
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Cyanocobalamin (vitamin B_{12})	5 mcg
Folic acid	0.5 mg
Ascorbic acid (vitamin C)	500 mg

Description: For prophylactic or therapeutic nutritional supplementation concomitant with levodopa therapy in patients with Parkinson's disease and syndrome, Larobec provides high potency dosages of the major B-complex vitamins, without pyridoxine (vitamin B_6) which has been reported[1,2] to reduce the clinical benefits of levodopa therapy. B-complex vitamins are essential in the anabolism of carbohydrate and protein and in hematopoiesis. Larobec also contains therapeutic quantities of ascorbic acid, a substance involved in intracellular reactions such as tissue repair and collagen formation.
Indications: Larobec is indicated for supportive nutritional supplementation when a water-soluble vitamin formula (without pyridoxine) is required prophylactically or therapeutically in patients under treatment with levodopa.
Warning: Administration of vitamin B_6 may be required if signs of pyridoxine deficiency develop. Larobec is not intended for treatment of pernicious anemia or other primary or secondary anemias. Neurologic involvement may develop or progress, despite temporary remission of anemia, in patients with pernicious anemia who receive more than 0.1 mg of folic acid per day and who are inadequately treated with vitamin B_{12}.
Dosage and Administration: One or two tablets daily, as indicated by clinical need.
How Supplied: Orange-colored, capsule-shaped tablets, imprinted Roche 73; bottles of 100.
References:
1. Duvoisin, R. C., *et al.*: *Trans. Amer. Neurol. Assoc., 94*:81, 1969. 2. Cotzias, G. C.: *J.A.M.A., 210*:1255, 1969.

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Tepanil® Ten-tab®

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(diethylpropion hydrochloride, N.F.)

works on the appetite not on the 'nerves'

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Contraindications: Concurrently with MAO inhibitors, in patients hypersensitive to this drug; in emotionally unstable patients susceptible to drug abuse.

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Adverse Reactions: Rarely severe enough to require discontinuation of therapy, unpleasant symptoms with diethylpropion hydrochloride have been reported to occur in relatively low incidence. As is characteristic of sympathomimetic agents, it may occasionally cause CNS effects such as insomnia, nervousness, dizziness, anxiety, and jitteriness. In contrast, CNS depression has been reported. In a few epileptics an increase in convulsive episodes has been reported. Sympathomimetic cardiovascular effects reported include ones such as tachycardia, precordial pain, arrhythmia, palpitation, and increased blood pressure. One published report described T-wave changes in the ECG of a healthy young male after ingestion of diethylpropion hydrochloride; this was an isolated experience, which has not been reported by others. Allergic phenomena reported include such conditions as rash, urticaria, ecchymosis, and erythema. Gastrointestinal effects such as diarrhea, constipation, nausea, vomiting, and abdominal discomfort have been reported. Specific reports on the hematopoietic system include two each of bone marrow depression, agranulocytosis, and leukopenia. A variety of miscellaneous adverse reactions have been reported by physicians. These include complaints such as dry mouth, headache, dyspnea, menstrual upset, hair loss, muscle pain, decreased libido, dysuria, and polyuria.

Convenience of two dosage forms: TEPANIL Ten-tab tablets: One 75 mg. tablet daily, swallowed whole, in midmorning (10 a.m.); TEPANIL: One 25 mg. tablet three times daily, one hour before meals. If desired, an additional tablet may be given in midevening to overcome night hunger. Use in children under 12 years of age is not recommended

T-103 / 2/71 / U.S. PATENT NO. 3,001,910

THE NATIONAL DRUG COMPANY
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Painful night leg cramps...

unwelcome bedfellow for any patient– including those with arthritis, diabetes or PVD

One thing patients can sleep without, particularly patients with chronic disease conditions such as arthritis, diabetes or PVD, is painful night leg cramps. Although seldom the presenting complaint, night leg cramps can tie your patients up in painful knots. Now, just one tablet of QUINAMM at bedtime can usually bring an end to shattered sleep and needless suffering. Your patients will sleep restfully—gratefully—with QUINAMM, specific therapy to prevent painful night leg cramps.

Prescribing Information—Composition: Each white, beveled, compressed tablet contains: Quinine sulfate, 260 mg., Aminophylline, 195 mg. **Indications:** For the prevention and treatment of nocturnal and recumbency leg muscle cramps, including those associated with arthritis, diabetes, varicose veins, thrombophlebitis, arteriosclerosis and static foot deformities. **Contraindications:** QUINAMM is contraindicated in pregnancy because of its quinine content. **Precautions/Adverse Reactions:** Aminophylline may produce intestinal cramps in some instances, and quinine may produce symptoms of cinchonism, such as tinnitus, dizziness, and gastrointestinal disturbance. Discontinue use if ringing in the ears, deafness, skin rash, or visual disturbances occur. **Dosage:** One tablet upon retiring. Where necessary, dosage may be increased to one tablet following the evening meal and one tablet upon retiring. **Supplied:** Bottles of 100 and 500 tablets.

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DIVISION OF RICHARDSON-MERRELL INC.
PHILADELPHIA, PENNSYLVANIA 19144

Quinamm™
(quinine sulfate 260 mg., aminophylline 195 mg.)

Specific therapy for night leg cramps

Q103 2/71



"When I prescribe medicines, I must be certain I'm right!"

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In my practice of medicine, my first obligation is to my patients. When I prescribe a drug product, my purpose is to select a drug that will help the patient and do the job that I want it to do. I expect it to be of correct potency, accurate in dosage, with the precise amount of active ingredient, to be absorbed by the body at the proper time.

My feeling is that when I order a drug and I specify the precise product I want, I can control what my patients are going to get.

For their welfare and my own sense of security, I go with the drug products that experience has shown me work well. They may be brand name drugs . . . or they may be quality medicinals sold by their generic names. But they must be drugs that have proved they will do the job. I want to know their source and the reputation of the manufacturer. This freedom of choice should be mine, based on my knowledge and experience. With the potency of today's drugs, I don't know any safe ways to cut corners.

Another point of view . . .

Pharmaceutical Manufacturers Association,
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(fluorouracil)
cream/solution

In the treatment of solar/actinic keratoses–

An alternative to cold, fire and steel

2/23/68
Before treatment with 5% 5-FU cream. Patient R. G., 78 years old, shows extensive skin changes due to weathering and severe solar/actinic keratoses.

3/26/68
Following one month of therapy. Intense erythematous reaction is seen at sites of keratoses. Normal skin has not reacted. Some areas which had reacted initially have undergone healing despite continued topical application of 5% 5-FU.

6/11/68
Ten weeks after discontinuance of therapy. All areas have healed completely. Residual mild erythema remains in some areas. This patient also had seborrheic keratoses which, as expected, have not reacted. There is no evidence of residual lesions or recurrences.



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An alternative to conventional therapy

Efudex (fluorouracil) offers the physician a topical alternative to cryosurgery, electrodesiccation and cold-knife surgery in the treatment of solar/actinic keratoses. It is effective, comparatively inexpensive and especially well suited for treatment of these multiple lesions. Important, too, is the highly desirable cosmetic result. Clinical experience demonstrates that treatment with Efudex results in an extremely low incidence of scarring.*

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In clinical trials, depending on the dosage form and strength used, complete involution occurred in 77 to 88 per cent of lesions following treatment. The rate of recurrence was low, ranging from 1.7 to 5.6 per cent up to a year after completion of therapy. When new lesions appeared, repeated courses of Efudex therapy proved effective.*

Predictable therapeutic response

Two to four weeks constitutes a typical course of Efudex therapy. The response is usually characteristic and predictable. After three or four days of treatment, erythema begins to appear in the area of keratoses. This is followed by an intense inflammatory response, scaling and occasionally moderate tenderness or pain. The height of the inflammatory reaction generally occurs two weeks after the start of therapy, and then begins to subside as treatment is stopped. Within two weeks of discontinuing medication, the inflammation is usually gone. A mild erythema may remain for two or three months before gradually receding. Since this response is so predictable, lesions which do not respond should be biopsied.

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Efudex is available as a 2% or 5% solution or as a 5% cream. It is applied twice daily by the patient with a nonmetal applicator or suitable glove.

Before prescribing Efudex, however, two important considerations: First, please consult the complete prescribing information for precautions, warnings and adverse reactions. Second, advise the patient that treated lesions should respond with the characteristic but transient inflammation. A positive sign that Efudex is working for them.

*Data on file, Hoffmann - La Roche Inc., Nutley, New Jersey.

Before prescribing, please consult complete product information, a summary of which follows:

Indications: Multiple actinic or solar keratoses.

Contraindications: Patients with known hypersensitivity to any of its components.

Warnings: If occlusive dressing used may increase inflammatory reactions in adjacent normal skin. Avoid prolonged exposure to ultraviolet rays. Safe use in pregnancy not established.

Precautions: If applied with fingers, wash hands immediately. Apply with care near eyes, nose and mouth. Lesions failing to respond or recurring should be biopsied.

Adverse Reactions: Local—pain, pruritus, hyperpigmentation and burning at application site most frequent; also dermatitis, scarring, soreness and tenderness. Also reported—insomnia, stomatitis, suppuration, scaling, swelling, irritability, medicinal taste, photosensitivity, lacrimation, leukocytosis, thrombocytopenia, toxic granulation and eosinophilia.

Dosage and Administration: Apply sufficient quantity to cover lesion twice daily with nonmetal applicator or suitable glove. Usual duration of therapy is 2 to 4 weeks.

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Something of Permanence

IN THE BEGINNING there's you and your patient and a blank piece of paper. Of the three, the paper will emerge as survivor in the great majority of cases. The mortals and the relationship that exists between them are relatively transient. The record of that relationship can be permanent. It is the clinical record which serves as the well-spring of all our knowledge in the medical arts and sciences. Also, it is the record which provides the foundation for the medical care our patients will receive. As that care becomes more sophisticated, the record becomes more important. As the varieties and potencies of drugs and therapeutic techniques increase, the medical record becomes more essential to success. As our environment becomes more hostile to man, the medical record becomes more vital.

Converting blank pieces of paper to good medical records may well be the physician's greatest responsibility to his patients. It may be the only significant contribution he makes to many of his patients. It will certainly be the most enduring.

Although few of us question the traditional value of medical records, we are not inclined to view them as clinical tools. We don't think of them in the category of x-rays, antibiotics, operating rooms and cobalt bombs. But we should. The accurate, detailed and indexed medical record has no equal as a diagnostic and therapeutic tool. No other clinical device or instrument can so effectively serve the welfare of our patients.

Consider the physician's impossible task of remembering which of his patients are allergic to penicillin or sulfa drugs; which are heavy smokers who should have periodic chest x-rays; which have family histories of diabetes and should be observed for the sometimes subtle manifestations of the disease; which have had peptic ulcers or tuberculosis or glaucoma who should not be given various drugs; which have had anaphylactic reactions to insect bites who should carry with them certain drugs and be carefully instructed in their use. With a good medical record containing a complete summary of diagnoses, these tasks become easy.

Consider the improbability of a physician being able to remember all of the drugs and medications, prescribed and proprietary, which any one of his patients may be taking. A complete and current list of all medications is indispensible to good medical record. It can help solve many medical mysteries . . . such as bleeding in the patient who takes an anticoagulant and an aspirin-containing effervescent antiacid . . . or the night blindness in the truck driver who takes mineral oil after each meal . . . or the severe depression which appears in the hypertensive who is being treated with reserpine. Much about drug synergism, antagonism and side effects is already known and certainly more will be discovered. Our knowledge in this field is directly and almost exclusively dependent upon the maintenance of good medical records. Without them all learning will be slow, hazardous and painful.

Of course, we can wait for tomorrow and the computer. Or we can inform the patient and trust him to remember everything we failed to record. Or we can hope the next physician he sees will believe that something tangible should come from the patient-physician relationship . . . something of value to our successors . . . something of permanence. *MRJ* □



National Health Insurance has become the hottest domestic issue of the day. If you wish to look ahead and predict the biggest battle of the 92nd Congress, this will be it. NHI is really nothing new. Beginning with the Wagner-Murray-Dingall Bill in 1943 it has progressed phenomenally since; given the added emphasis of Medicare and Medicaid. The major cause for this clamor has been a massive and largely successful campaign to undermine the confidence in *Private Medical Practice*. A campaign of such proportions that friends of former years now echo dutifully "But we must do something about the Health Crisis."

This so-called Health Crisis has generally followed these lines:

1. America ranks very low in infant mortality
2. Medical bills being outrageously high
3. Serious maldistribution of doctors
4. Critical doctor shortage

Let's examine the record:

1. Our infant mortality rates are true, not varying by not recording minimum weights, lapse of time before reporting as is done in Sweden with the best reported mortality rates (many infant deaths are never reported). Politicians like to use this "apples and oranges" comparison without really telling the truth.

2. In the years 1956 to 1968, the average annual increase in physicians' fees was 3.7 percent compared to 4.2 percent increase in general wages. (Physicians' earnings account for less than 15 percent of total health expenditure.) In 1970 medical care went up 12.9 percent, meat and groceries were up 13.6 percent and insurance was up 21.4 percent. Medical costs *are* increasing but so are other costs.

3. Experience in nations with NHI shows this system increases the distribution problem rather than solves it, due to lack of incentive to go to rural areas (check if you will our own Rural Health Council's Programs). By standards in nations with government run medicine there is little to criticize in our distribution.

4. The doctor stortage. While there may never be enough physicians, the U.S. has more per population than any major nation in the world—(1-640 population). Here too many "would be practicing physicians" have been drawn away by growing Federal Bureaucracy which wrongfully subsidizes them in repetitive research programs, and administrative positions. *This should stop.*

In his introduction to Daniel Scharr's book *"Don't Get Sick in America,"* Senator Kennedy writes "Today the U.S. is the only major industrial nation in the world that does not have a National Health Service or a program of National Health Insurance." This implication that NHI offers substantial improvement in health care is wrong. The truth is just the opposite. Britain has one physician for every 1,150 people. One could write endlessly on this nation's problems of waiting lists, poor care, overcrowded facilities, etc., but this also is well known. When he proposed National Health Service in England, Lord Beveridge described it as "the most enlightened social experiment in the history of mankind." Twenty years later this colossal mess has become the despair of those treated and the disaster of those working within its confines.

Could I but convince each member of the OSMA what twenty years of upcoming proposed legislation would do to his private practice of medicine and surgery, I am sure there would be a long waiting line for those trying to help alleviate and prevent this catastrophe. To say that it is too late is untrue—the time for action was never better. Why not for starters join up 100 percent in OMPAC? □

Sincerely,

E. L. Calhoon M.D.

OSMA JOURNAL/scientific

Anemia in Pregnancy

WARREN M. CROSBY, M.D.
RICHARD A. MARSHALL, M.D.

Anemia during pregnancy may have serious consequences for both the mother and fetus. Prophylactic administration of iron and folic acid is recommended in all prenatal cases.

INTRODUCTION

DURING the latter part of pregnancy, an increase in plasma volume normally exceeds the increase in red cell mass.[1] The resultant hemodilution has been termed the "physiologic anemia" of pregnancy. Hemodilution, however, rarely reduces the hematocrit below 36 per cent or the hemoglobin concentration below 12 gms. percent. Pregnancy increases the demands for all hematopoetic substances from increased maternal hemoglobin production and the demands of the fetus. This increased demand often exceeds the supply of one or more of these substances. Nutritional anemia occurs with particular frequency among adolescents and the poor. Maternal death from blood loss is more common among anemic gravidas, and postpartum hemorrhage that leads to such blood loss is often preceded by anemia. Premature delivery and perinatal mortality are more frequent when the mother is anemic, even if she suffers none of the other complications.

The purpose of this article is to suggest that prevention, detection and treatment of anemia should be a part of prenatal care for every pregnant woman, and that the complications of anemia can be minimized or avoided entirely by simple measures.

COMMON TYPES OF ANEMIA

1. Iron deficiency. Most normal women are in precarious iron balance during their reproductive years. Normal menstrual blood loss results in loss of 15 to 30 mg. of iron, and an equal amount must be absorbed from the diet during the month or the additional iron will be removed from iron stores in the marrow.[2] Scott and Pritchard have shown that two-thirds of healthy nulliparous college girls have decreased iron stores (less than 700 mgm).[3] Even small increases in menstrual blood loss or decreases in dietary intake of iron may lead to iron deficiency anemia. During pregnancy the demand for iron (600 to 700 mgm) exceeds that saved by the absence of menstrual blood loss (150 to 200 mgm).[4] The additional amount must be obtained from increased dietary iron absorption and adequate marrow reserves of iron, or anemia results. Iron deficiency is the most common type of anemia encountered during pregnancy: As many as 50 per

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cent of a normal obstetrical clinic population may suffer this complication.[15] Severe iron lack anemia is accompanied by hypochromia and small red cells, easily recognized on peripheral blood smear, but less severe grades may have normal appearing cells.

2. Folic Acid Deficiency. Folic acid is an important B vitamin, necessary for many biochemical reactions throughout the body. For our purposes, the most important of these is DNA synthesis.[5] In folic acid deficiency, there is a decrease in the rate of DNA production. With less DNA available, there is reduction in mitotic activity and cellular reproduction. In tissues with a higher rate of turnover, the rate of cellular production diminishes and will ultimately produce a deficiency of that type of cell. In the case of bone marrow, the result is megaloblastic anemia. In severe deficiency of folic acid, there may be decreased production of granulocytes and platelets as well. Such pancytopenia may be fatal. The dietary demands for folic acid are small in the nonpregnant state; 50 micrograms daily is enough to prevent folic acid deficiency.[6] Dietary folic acid is available in green leafy vegetables. It is in low concentration in milk, cereal grains and meats, except liver and kidney. When green leafy vegetables are eaten raw or lightly cooked, one or two meals a week are sufficient to avoid folic acid deficiency. When such vegetables are cooked for a long period of time, the folic acid content is destroyed so that folic acid deficiency may develop, even though the diet seems to be satisfactory.

During pregnancy the minimal daily requirement of folic acid rises to between .350 and .500 mg. per day, a ten fold increase over that required in the nonpregnant state.[7] In the absence of adequate dietary intake of folic acid during pregnancy, folic acid will be removed from liver stores. The body contains a 30-day supply of folic acid. The pregnant woman on a folic acid deficient diet will show no evidence of the deficiency until the 30-day storage supply is depleted. The first observable change is a decrease in the serum concentration of folate.[8] In seven to ten weeks, dysplastic granulocytes with hypersegmented nuclei can be found in the peripheral blood. Anemia is not often present at this time. After 16 to 20 weeks on a folic acid deficient diet, the folate content of red blood cells becomes diminished and they appear larger than normal (oval macrocytes). After 20 weeks of folic acid deficiency, clinical anemia develops. The peripheral blood smear may show oval macrocytes; bone marrow aspiration showing megaloblasts is diagnostic.

3. Combination. In a series of blood determinations in conjunction with the Texas Nutritional Survey, McGanity found a low serum folic acid in 77 percent of the samples.[16] None of these persons was reported to be pregnant; 60 percent were below the "poverty line" as defined by the Survey.[17] Thirty-six percent had deficiency in the amount of folic acid in their red cells, and 22 percent were anemic. Anemia in most cases was a combination of both iron and folic acid deficiency. The combination makes the etiology of the anemia somewhat more difficult to establish, because the iron deficiency tends to make the circulating red cells smaller while the folic acid deficiency tends to make them larger. The blood smear in this situation usually shows anisocytosis, hypochromic red cells and hypersegmented granulocytes. Marrow examination will reveal megaloblastic erythroid hyperplasia and no stainable iron. In spite of the apparent lack of iron stores, the serum iron concentration may be normal or high as it is in pure folic acid or B-12 deficiency. The serum iron will drop precipitously when the patient is treated with folic acid alone. Hemoglobin production will not be optimal until supplemental iron is added to the treatment regimen.

4. Unusual Types of Anemia. Hereditary anemias associated with abnormal hemoglobin structure are called hemoglobinopathies. Sickle cell disease is the most common type that produces severe anemia in pregnant Negroes. When the patient inherits the sickle hemoglobin gene from only one parent, she is said to have the sickle cell trait. Hemoglobin electrophoresis reveals both sickle (S) and adult (A) hemoglobin. This heterozygous condition is not

necessarily associated with anemia and when anemia occurs it is due to a nutritional deficiency of iron or folic acid. When both parents contribute the sickle gene, the patient has sickle hemoglobin exclusively. In this homozygous condition the abnormal hemoglobin produces an increased rate of red blood cell destruction and anemia is the invariable result. Although most patients with homozygous sickle hemoglobin die before puberty, a few survive and may present during pregnancy with severe anemia. Sickle-C disease results when the patient is doubly heterozygous for the two allelic genes; this results in a hemolytic anemia which is mild under most circumstances, but in pregnancy sickle-C disease may become severe enough to threaten the life of the mother. In both sickle-cell anemia and sickle-C disease, pregnant patients are at high risk to develop painful crises, increasing anemia, pyelonephritis, and sometimes fatal pulmonary arterial occlusion with in situ thromboses or thrombi containing marrow which have embolized from bone infarcts. Exchange transfusion in patients in life-threatening crises may be of temporary benefit.[10] These diseases are easily detected by obtaining routine sickle preparations on all Negro patients followed by hemoglobin electrophoresis on those who demonstrate sickling. Other hemoglobinopathies which occasionally may be worsened by pregnancy include sickle thalassemia[11] and homozygous C diseases.[12] Thalassemia may also worsen during pregnancy; again, the homozygote is severely anemic and usually dies in childhood. Occasionally, this disease is modified enough to allow a female to reach an age sufficient for pregnancy.[13] Thalassemia minor, the heterozygous state, is frequently asymptomatic until pregnancy which may result in a mild anemia which is hypochromic and usually misdiagnosed as due to iron deficiency until iron therapy fails. The presence of target cells and high serum iron concentration should prompt the physician to obtain a hemoglobin electrophoresis which usually shows an increase in the Hb_F or Hb A_2 fractions which are normally present.

Other anemias which are occasionally encountered in pregnancy are secondary to serious underlying diseases: Leukemia, chronic renal failure, systemic lupus erythematosus, and aplastic anemia.

TREATMENT

Every prenatal patient should have a complete blood count on her first visit. If the hemoglobin exceeds 12 gm. percent or the hematocrit is above 36 percent, we recommend routine administration of oral ferrous sulfate, gluconate or fumarate 300 mgm, and folic acid 0.5 mgm daily. Not all prenatal vitamins contain folic acid and many do not contain an adequate dose to prevent folic acid deficiency.[14] The blood count should be repeated once in each trimester to detect any failures of prophylactic treatment.

Mild anemia (hemoglobin ten to twelve gm percent, hematocrit 30 to 36 percent) should be actively treated with oral pharmacologic doses of iron salts (300 mgm t.i.d.) and folic acid (at least 1.0 mgm daily). A baseline reticulocyte count should be obtained and repeated seven to fourteen days after initiation of therapy to confirm the expected increase. If there is no increase in reticulocytes in seven to fourteen days or improvement in hemoglobin concentration in four to six weeks, the patient should have a more thorough evaluation.

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Moderate to severe anemia is accompanied by hemoglobin concentrations below 10 gm percent or hematocrit below 30 percent. Patients with moderate or severe anemia, and those with mild anemia that has not responded to therapy should have a repeat blood count (to confirm the presence of anemia) including platelet and reticulocyte counts and a peripheral blood smear to detect abnormal red cell morphology and hypersegmented neutrophils. Bone marrow aspiration for cellular morphology and iron stain should be done to detect megaloblastic changes, and to exclude both leukemia and aplastic anemia. A stool guaiac test should also be done to rule out gastrointestinal bleeding as the cause for unresponsive iron deficiency. Inability to ingest or absorb iron or folic acid requires parenteral administration. Parenteral administration offers no advantage to oral intake provided gastrointestinal absorption is normal and the patient takes the prescribed dose.

Sickle preparation should be performed on all Negro women. A positive test requires hemoglobin electrophoresis to provide an accurate diagnosis. Patients with sickle cell anemia or sickle-C disease should be given pharmacologic doses of folic acid, but they do not require additional iron.

SUMMARY

The causes of anemias in pregnancy have been discussed and a practical plan of management has been outlined. We advocate the prophylactic administration of iron and folic acid in "healthy" women and an extensive hematologic evaluation followed by specific therapy in moderate or severe anemia. □

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Dialysis in Oklahoma

BILLY J. MATTER, M.D.

Uremia, recently a uniformly fatal disease, can now often be effectively treated by dialysis or transplantation. Facilities for these modern treatments are of limited availability in Oklahoma.

APPROXIMATELY 100,000 people in the United States die each year due to renal failure. At present only one percent of this number are receiving treatment by dialysis or transplantation due to lack of facilities, staff and funds.

The Report of the Committee on Chronic Kidney Disease[1] identified 5,500 people dying of primary kidney disease each year in the United States. In addition, 19,600 individuals die each year of related diseases affecting the kidney, such as hypertension and hypertensive renocardiovascular disease. The remaining 75,000 individuals dying of kidney failure have some other disease, such as cancer, diabetes mellitus, lupus erythematosis, liver disease or myocardial disease which presently precludes chronic therapy of the renal failure.

Of 1,000 Oklahomans dying of renal failure each year, a minimum of 250 patients could be kept alive and productive by utilizing techniques of chronic dialysis or transplantation.

METHODS OF TREATMENT

Effective but expensive methods of treating terminal kidney failure have been developed; dialysis and renal transplantation.

Peritoneal dialysis is an effective treatment for renal failure but its use has generally been limited because of discomfort to the patient, loss of large quantities of protein during repeated dialyses and the occurrence of peritonitis in a significant number of patients. Chronic renal failure is, therefore, preferentially treated with hemodialysis or transplantation. Peritoneal dialysis is commonly employed in the treatment of acute renal failure and should be available in most hospitals in the state.

Renal transplantation is often preferred to dialysis in that there is a chance for a more normal life following a successful transplant. Major problems arise in securing suitable kidneys for transplant, the necessity of dialysis while awaiting transplant, the high cost, the complications of transplantation and of immunosuppressive drugs and limited transplant survival.

Hemodialysis with the artificial kidney is well established as a form of palliative treatment for terminal uremia. But major

problems arise in making it available to patients who might benefit because of its high cost, the frequency of treatments and the need for providing facilities near the patient's home or place of employment.

Indications for hemodialysis in the center generally fall into five categories:

Dialysis for acute, frequently non-renal problems

Dialysis in preparation of kidney transplant

Dialysis following transplantation

Chronic dialysis in the hospital hemodialysis unit

Training for home dialysis

Dialytic therapy is life-saving in certain patients following ingestion of lethal drugs or poisons, following shock or surgery and in those who have compromised renal function due to another disease such as diabetes, heart disease, etc. These patients require only a limited number of dialyses for the acute problem. A hemodialysis team performing frequent dialyses handle these acute problems much better than the group performing only an occasional hemodialysis.

Candidates for renal transplantation require hemodialysis while awaiting a transplant. Bilateral nephrectomies are performed prior to transplantation in order to prevent an infection being transmitted from diseased kidneys to the transplant, to remove a cause for hypertension (via renin) and to remove a source of antigen which might promote antibody production and thereby early rejection. Vigorous hemodialysis is necessary to prepare the patient for nephrectomy and to maintain nutrition of the patient while awaiting transplantation. Cadaveric kidneys are difficult to obtain, resulting in some patients requiring dialysis for over a year while awaiting a suitable transplant.

The transplanted cadaveric kidney commonly does not function immediately. Hemodialysis must be continued for a period of one to six weeks following the transplant until the homograft functions adequately to maintain homeostasis of the recipient. A kidney transplanted from a live, closely-related donor usually functions immediately and a post-transplant dialysis is rare in this group.

Repeated hemodialyses are effective and lifesaving measures to patients with terminal renal failure. The original five people selected for chronic dialysis were started ten years ago in Seattle, Washington. One died of a myocardial infarction and the remaining four are continuing twice weekly dialysis and working regularly. The disadvantages of this mode of therapy are the cost and the inability to constantly expand hospital dialysis programs. That is, when dialysis center facilities are filled, a new patient cannot be accepted for dialysis unless one of the incumbents dies. If, on the other hand, patients are transplanted or placed on home dialysis, broader use of the center facilities is permitted.

Home dialysis has proved to be an effective method of long-term hemodialysis. The advantages of home dialysis are the convenience to the patient, better acceptance by the patient and decreased cost compared to hospital hemodialysis. The latter point is very important. Following the purchase of a hemodialysis machine for approximately $5,000 and the three month training course for home dialysis, the yearly dialysis cost decreases markedly. Therefore, home dialysis is the most economical, although admittedly still expensive, mode of chronic dialysis available.

FACILITIES

Although interest has been generated to establish care for Oklahomans with renal failure, facilities are woefully lacking for the number of patients who could be helped. Dialysis units have been established in sev-

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Table I

Dialysis Units in Oklahoma	Patients
University of Oklahoma-Veterans Administration Hospital, Oklahoma City, Oklahoma	18
St. Anthony Hospital, Oklahoma City, Oklahoma	6
Baptist Hospital, Oklahoma City, Oklahoma	3
Hillcrest Hospital, Tulsa, Oklahoma	6
St. Francis Hospital, Tulsa, Oklahoma	3
Municipal Hospital, Bartlesville, Oklahoma	0
Pawnee Indian Hospital, Pawnee, Oklahoma	1
Baptist Hospital, Miami, Oklahoma	1
Stillwater Municipal Hospital, Stillwater, Oklahoma	1

eral hospitals in Oklahoma. Table I lists the hospital hemodialysis units and the numbers of patients regularly dialyzed in January, 1971. The number of patients regularly dialyzed in each unit necessarily fluctuates. For instance, the St. Anthony unit served from three to ten patients at any one time during the past year.

An additional sixteen patients have been trained for home dialysis and are now receiving dialysis in their homes. Twelve of these were trained in the University of Oklahoma Medical Center-Veterans Administration Hospital, one at St. Anthony Hospital, Oklahoma City, Oklahoma; three at the University of Texas, Galveston, Texas (funded by U.S. Public Health Service). Six patients are presently receiving home dialysis training at the Veterans Administration Hospital Center.

As knowledge of facilities becomes available, demand for the therapy increases steadily. The activity of the University of Oklahoma Medical Center-Veterans Administration Hospital Unit to date is summarized in Table II.

Other active hemodialysis units in Oklahoma have seen a steady and continued demand for services. Their activity is summarized in Table III.

Minnesota has established a comprehensive system of dialysis, consisting of home dialysis, dialysis in the community hospital and dialysis in the medical center (regional center). Patients receiving dialysis in the home or community hospital are sent to the regional center if complications develop. The cost of dialysis in the three systems is summarized in Table IV.[2]

The home dialysis cost does not include the $3,000 to $5,000 needed for purchase of the machine and costs of in-center dialysis during the three months training period.

Hemodialysis programs are costly to establish, equip, and operate in terms of space, equipment and manpower requirements. It is much more costly to treat the dialysis patient in the hospital than in his home. With improvements in and simplifications of dialysis equipment available for home use, as well as decreasing costs for such equipment, home dialysis is preferred for those patients who can manage such programs. The cost/benefit ratio is more favorable. In terms of patient and family convenience, as well as psychologically, the patient capable of managing it does better on a home program. The hospital facilities are thus made available for more patients not suitable for home programs, to teach patients being prepared for home dialysis and for backup care of home dialysis patients.

Transplants, including pre-transplant, immediate aftercare and donor care will cost an average of $15,000 to $20,000 per case.

The costs of hemodialysis and transplant care are not so great that from a strict

Table II

HEMODIALYSIS AT OKLAHOMA CITY VA HOSPITAL

	Jul.-Sep. 1968	Oct.-Dec. 1968	Jan.-Mar. 1969	Apr.-Jun. 1969	Jul.-Sep. 1969	Oct.-Dec. 1969	Jan.-Mar. 1970	Apr.-Jun. 1970	Jul.-Sep. 1970	Oct.-Dec. 1970
No. of dialyses	97	153	161	206	229	259	312	391	441	456
No. of patients dialyzed	15	14	12	12	14	18	22	28	29	29
No. of transplants	1	4	3	2	0	3	2	1	2	1
No. of candidates evaluated for the program	22	16	22	21	19	28	30	26	5	12
Total number of patients on home dialysis	0	0	0	0	2	4	5	7	10	12

Table III

HOSPITAL DIALYSES IN OKLAHOMA

	Jul.-Sep. 1969	Oct.-Dec. 1969	Jan.-Mar. 1970	Apr.-Jun. 1970	Jul.-Sep. 1970	Oct.-Dec. 1970	Total
St. Anthony Hospital							
Number of dialyses	11	89	176	180	147	132	715
Number of patients							41
Number of acute patients							27
St. Francis Hospital							
Number of dialyses	20	23	32	34	67	50	230
Number of patients							16
Number of acute patients							5
Hillcrest Hospital							
Number of dialyses			52	55	73	106	286
Number of patients							12
Number of acute patients							6

cost/benefit standpoint it could be argued that the increasing amounts of money being spent for hemodialysis and kidney transplantation should be more productively spent in other areas of disease prevention or restorative treatment. At present glomerulonephritis and polycystic kidney disease are not preventable, nor is it possible to prevent progression to renal failure. Nevertheless, because of the very compelling arguments for medical science to prolong human life, particularly when there is a reasonable chance of restoring the individual to a self care and economically self sufficient status, kidney transplant and dialysis programs will continue to be established and to function. Society must establish its own priorities with respect to spending its health care dollars and hemodialysis with or without kidney transplants offers an effective means of restoring and maintaining many selected renal failure patients to self sufficiency and productive capacity for varying but frequently prolonged periods of time.

THE FUTURE

The rehabilitation of patients with chronic uremia is a complex task involving problems in many different areas and thus people with many different skills. Much has been learned in the short time that chronic hemodialysis has been used in the treatment of chronic uremia.

Proximity of dialysis to the home and job, support by the community and family and the patient's understanding of his disease are integral in rehabilitation. In planning for a dialysis unit and rehabilitation, it is important to involve the following services in addition to the physician: Administration, nursing, social work, psychiatry, dietary, business office, and hospital engineering. It may also be very helpful to involve some or all of the following disciplines: Radiology, clinical laboratory, pharmacy, medical and nursing education, the county departments of public health and social services, visiting nurse association, voluntary agencies which might be helpful, occupational therapy, physical therapy and vocational rehabilitation, depending upon local resources.

Approximately twelve community dialysis centers should be established in Oklahoma. These community or satellite centers are envisioned as less sophisticated and less well

Table IV

MAINTENANCE COST OF HEMODIALYSIS

	Regional Center	Community Hospital	Home
Frequency of dialysis per week	2	2	3
Hemodialysis cost per year	$19,500	$ 8,000 to $13,600	$2,800 to $4,000
Complications and other costs per year	500	4,000 to 5,000	1,145 to 3,123
Total cost per year	20,000	12,000 to 18,600	3,945 to 7,123
Cost per dialysis	200	120 to 186	25 to 45

staffed than the parent hemodialysis center. The medical and supportive staffs for such satellite units would be given appropriate training at the parent center. The prospective patients are referred from the satellite to the main unit for evaluation and treatment of severe or perplexing problems which arise. Such units may perform acute dialysis, continue selected chronic dialysis and/or train the patient for home dialysis after his dialysis program is stabilized. Patients on home dialysis would look to the nearest community center whenever problems occur.

Each hospital in the state with 50 beds or more should have the capability of peritoneal dialysis. Peritoneal dialysis is a simpler method of maintaining patients with renal failure. The material, equipment and in-hospital space requirements are simpler than hemodialysis although peritoneal dialysis has not gained acceptance as chronic therapy.

Peritoneal dialysis is a lifesaving treatment in renal failure and should be in the armamentarium of general hospitals. Training programs for personnel interested in peritoneal or hemodialysis are being started.

SUMMARY

Of 1,000 people dying of renal failure in Oklahoma each year, 250 would be considered acceptable candidates for dialysis or transplantation. Present facilities permit the acceptance of not more than 30 new candidates each year. The emphasis, therefore, has been to increase the number of transplants and the placement of patients on home dialysis in order to better utilize center facilities. The future should include the training of personnel to perform peritoneal and hemodialysis in community hospitals. □

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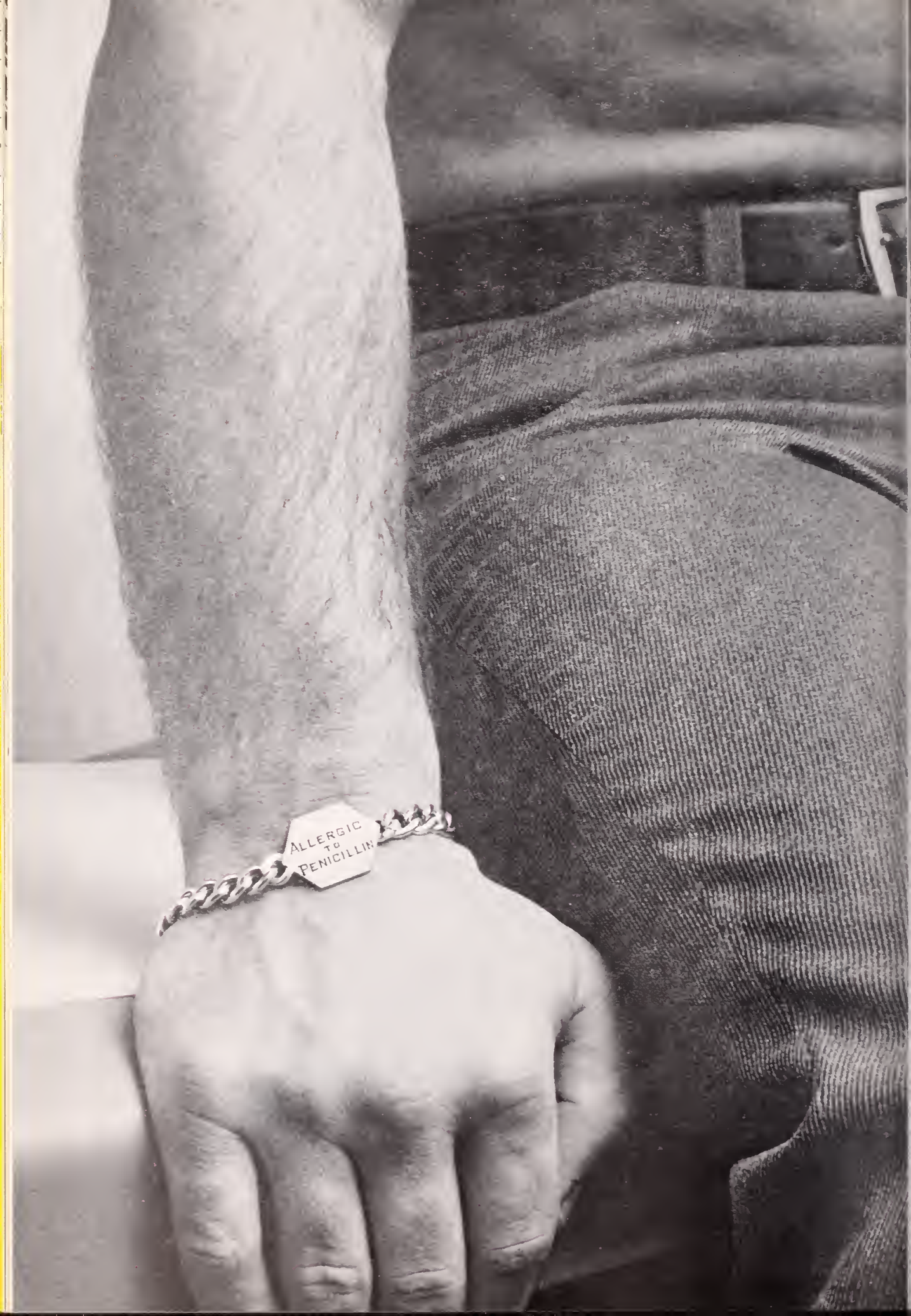
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Contraindications

Known hypersensitivity to erythromycin. I.M. preparation also contraindicated in patients hypersensitive to the "caine" type of local anesthetics.

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Occasionally abdominal discomfort, cramping, nausea or vomiting may occur; generally controlled by reduction of dosage. Mild allergic reactions, such as urticaria and other skin rashes, may occur. Serious allergic reactions have been extremely infrequent; if hypersensitivity is encountered consider appropriate countermeasures, e.g., epinephrine, steroids, etc., and withdraw drug. The rare possibility of overgrowth of nonsusceptible organisms should be kept in mind; if it occurs withdraw drug and institute appropriate treatment. Local venous discomfort, generally mild, may occur with I.V. administration. I.M. preparation is suitable for deep intramuscular administration only; restrict use in children with small muscle mass. A mild transient local discomfort sometimes occurs following rectal insertion of Erythrocin Suppositories; discontinue if significant discomfort persists.

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I. ORAL: In adults with mild to moderate infections caused by readily-susceptible organisms 1.0 Gm. daily; more severe infections or those caused by less susceptible organisms 2.0 Grams daily; unusually severe infections up to 4 or more Gm./day. Daily dose in children is 15 to 25 mg./lb./day depending upon severity of infection. Daily dose should be administered in divided doses at 4-to-6 hour intervals. Continue treatment for at least 48 hours after symptoms have subsided and temperature has returned to normal. In fulminating or life-threatening infections, a parenteral form of erythromycin is preferred.

II. PARENTERAL: Intravenous administration may be continuous or intermittent (6 to 8 hour intervals); 1 to 4 Gm. daily in adults; 15 to 25 mg./lb./day in children, depending upon severity of infection. Recommended I.M. dose is 100 mg. (2 ml.) for adults, 50 mg. (1 ml.) for children 30 lbs. or more and 1.4 to 1.8 mg./lb. in smaller children. Injections are usually given at 6 to 8 hour intervals; may be given at 4 to 6 hour intervals for severe infections.

III. RECTAL: Following therapeutic doses are recommended in children: to 20 lbs., 1-125 mg. suppository every 8 hours; 20 to 40 lbs., 1-125 mg. suppository every 6 hours.

Change to oral therapy as soon as practicable.

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Nasal Symptoms and Their Treatment

KINSEY M. SIMONTON, M.D.

The nose is a rather primitive organ which has simple symptoms. These in order of frequency of occurrence are: Obstruction, discharge, pain, swelling and odor. Obstruction and discharge when mild in degree are often physiologic in origin. Pain is not a common symptom from the nose and most "sinus headaches" are not of nasal origin. Consideration of the anatomy and physiology of the nose aids in interpretation of symptoms presented by the patient.

SYMPTOMS originating in the nose consist of obstruction, discharge, sneezing, pain or headache (or both), odor, impairment of smell and taste, and bleeding. The various disorders of the nose present these symptoms in many combinations. Despite the limited number of basic symptoms, the description of these and their variations is an important factor in diagnosis of nasal disorders.

From the Mayo Clinic and Mayo Foundation: Department of Otolaryngology and Rhinology.

Read at the meeting of the Oklahoma City Clinical Society, Oklahoma City, Oklahoma, October 26th-28th, 1970.

To evaluate the symptoms of the abnormal nose, one must consider the normal nose, its structure and its function.

ANATOMY AND FUNCTION OF THE NOSE

The nose is the air conditioner of the respiratory system. It exchanges heat and moisture from nose to air on inspiration and from air to nose on expiration. The nose cleans the air and senses and warns of irritants in the air.

To effect these exchanges, the nose is constructed as two narrow chambers containing a series of baffles which bring the air in close contact with moist surfaces. Heat is provided by a bed of erectile tissue in the mucosa of the turbinates and moisture is provided by mucous glands. Electric charges on the surface attract charged particles from the air. The nose soon would be blocked by a clod of mud if not continuously emptied by cilia on the surface of the mucosa.

The two nasal chambers alternate in active function. On the active side, the erectile tissue shrinks and mucus is discharged while on the resting side, engorged vessels and filling glands restrict the airway. When recumbent the dependent side of the nose rests.

Awareness of these functions is distress-

ing to some hypersensitive persons who may interpret the symptoms as pathologic, grouping them under the term "sinus."

The "symptoms of a normal nose" are (1) resistance to passage of air alternating from side to side; (2) discharge of mucus to throat, "postnasal drip" (this is discolored in dusty conditions); (3) watery drip from the anterior nose in cold weather, the condensed vapor from expired air; and (4) dryness of the anterior nares in dry atmospheres.

FUNCTION OF THE ABNORMAL NOSE

Hyperfunction is characterized by increase in resistance and volume of discharge. This is the normal state in some noses and results from chronic irritation in others. A degree of function which is comfortable in a cold, dry climate may be excessive and cause discomfort in a warm, humid atmosphere.

Hypofunction is an evidence of mucosal atrophy in which dryness is the predominant symptom. Dryness is associated with a burning sensation and may cause a feeling of tightness in an excessively open nose. This nose is most comfortable in warm, humid air.

SYMPTOMS OF THE ABNORMAL NOSE

Nasal symptoms are obstruction, discharge, pain, bleeding, hyposmia, and odor. The causes of nasal obstruction and discharge are listed in Tables 1 and 2, respectively. Nasal pain is found in conditions that produce pressure such as inflammation, allergy, and anatomic deformity (septal or traumatic), as well as when a tumor is present. Nasal bleeding is caused by dryness, trauma (factitial), and tumor or ulcer (or both); the bleeding also may be of idiopathic origin. Hyposmia can be of neural or nasal (obstruction or atrophy) origin, whereas symptom odors may be from chronic infections, necrotizing disease, tumors, severe atrophy, or foreign body.

SYMPTOM DIAGNOSIS OF NASAL DISEASE

Inflammation. The symptoms of inflammation cover a wide range and can be demonstrated during the progress of the common cold.

The Common Cold. The prodromal phase of dryness and burning is soon followed by the acute serous phase. The burning is supplanted by itching and sneezing, the dryness by copious discharge of watery or thin mucoid secretion. Obstruction of some degree is present and with it a feeling of fullness or pressure which may reach the proportions of pain in the paranasal regions. This is often considered the viral phase of the infection. General symptoms of malaise and fever are present.

The serous phase merges into the acute suppurative phase. Obstruction increases. The drainage is purulent and profuse. Generalized symptoms and local pressure or

Table 1
CAUSES OF NASAL OBSTRUCTION

1. Physiologic states
2. Congenital malformation
   (choanal occlusion, unilateral or bilateral)
3. Developmental (small nose, high palate)
4. Nasopharyngeal obstruction
   - Lymphoid hypertrophy
   - Juvenile angiofibroma
   - Malignancy
   - Stenosis (after surgery, after irradiation, severe inflammation)
5. Trauma
   - External deformity
   - Septal deformity
6. Inflammation
7. Allergy
8. Combined infection and allergy
9. Nasal polyposis
10. Systemic diseases
    - Hypometabolism
    - Collagen disorders
      (Wegener's granulomatosis)
    - Leukemoid disorders
    - Sarcoidosis
    - Tuberculosis
    - Syphilis
11. Drugs
    - Antitensive
    - Topical vasoconstrictors
12. Tumors
13. Foreign bodies
14. Atrophy

Table 2
CAUSES OF NASAL DISCHARGE

1. Physiologic states
   - Posterior (mucous blanket)
   - Anterior (condensate in cold air)
2. Extraneous irritants
3. Infections
4. Allergies
5. Trauma (cerebrospinal rhinorrhea)
6. Posterior nasal obstruction
   - Blocked drainage to the nasopharynx
   - Granulomas and tumors
   - Foreign bodies

pain (or both) are at their peak. Localized headache and tenderness over the maxillary, frontal, and orbital regions suggest involvement of the underlying sinuses. Sneezing is supplanted by nose blowing to clear the blocked airway. General symptoms are present.

In the subacute suppurative phase which follows, drainage becomes mucoid, and obstruction and congestion decrease. The airway may be cleared by nose blowing. General symptoms and pain disappear.

Chronic suppurative rhinitis is uncommon and occurs more frequently in children than in adults. The nose is blocked by heavy mucopurulent material. Discomfort is limited to obstruction. The sinuses may not be involved. Observations suggest that when unchecked, chronic suppuration leads to atrophy of the nasal mucosa.

Sinusitis. Sinusitis, defined as inflammation of the paranasal sinuses, again presents the symptoms of obstruction, discharge, pain or headache (or both), and hyposmia. In long-standing infections and infections of dental origin, offensive odor may be present.

A 1933 graduate of George Washington University School of Medicine, Kinsey M. Simonton, M.D., has been certified by the American Board of Otolaryngology. He is Emeritus Professor of Otolaryngology at the Mayo Graduate School of Medicine. Doctor Simonton is now practicing in Atlanta, Georgia. He is a member of the American Otologic Society, the American Laryngologic Association, the American Laryngological, Rhinological and Otological Society, Inc., and the American Academy of Ophthalmology and Otolaryngology.

Pain is an indication of altered pressure within the sinus and is not prominent when drainage is free. Pain occurs with both increased and decreased pressures, the so-called "vacuum" headache. Pain and headache are prominent in acute sinusitis, diminish in the subacute states, and are rare in chronic conditions. Most recurrent headaches attributed to sinusitis are of emotional or tension origin.

Acute inflammation of multiple sinuses is expected in the course of acute inflammatory rhinitis. The symptoms of pressure between the eyes and localized pain and tenderness over the frontal sinuses and maxillae suggest anterior sinal involvement. Pain deep in the head or in the occiput suggests posterior ethmoid or sphenoid infection. As the infection subsides to the subacute stage, the incidence and severity of pain diminishes, discharge becomes mucoid, and breathing is more free.

Acute localized sinusitis occurs without generalized nasal infection. Precipitating factors may be dental, swimming, and airborne or blood-borne infection. Infection of a single sinus causes localized pain, tenderness, and swelling in its region, with varied degrees of obstruction and drainage on the side of the lesion. General signs of infection are usual in the acute stage. In localized infection, as in multiple sinusitis, pain diminishes as the acute phase of inflammation subsides.

Chronic sinusitis is manifest principally by drainage, which varies from purulent to mucoid and which usually appears in the throat. The drainage causes cough and throat-clearing and may make the patient awaken at night. Obstructive lung disease, asthma, bronchitis, emphysema, and bronchiectasis are aggravated. Offensive odor is present from infections with certain bacteria such as *Escherichia coli* and *Proteus* and when a foreign body (tooth root) is present in the sinus.

Allergy. Allergic rhinitis presents itself as drainage, obstruction, sneezing, or pain. Variation of symptoms with the season, time of day, activity, environment, or ingestion of certain foods suggests an allergic basis for the disorder.

Acute seasonal (pollen) rhinitis is most

characteristic with sneezing, watery rhinorrhea, and obstruction as its manifestations. Reaction to other inhalants, dusts, molds, and animal danders may be as violent but with differing time distribution. Pain is present when swelling creates pressure within the nose or closes the ostium of a sinus.

Discharge is never purulent in pure allergic states but varies from watery to thick mucus. Watery secretion appears at the anterior nares, while more viscous secretions are carried to the choanae by ciliary action.

Obstruction is the prominent symptom of allergic states. This allergic mucosa is edematous in the acute stages. This process is reversible and subsides when the irritant is withdrawn. If the obstruction is longstanding and venous and lymphatic drainage is impaired, edema is not readily reversible, and in some instances, fibrosis occurs, creating permanent hypertrophy of mucosa.

Polyps. Continued transudation with impaired return of fluid creates pressures that are greater than the mucosa can withstand. Localized swellings occur and polyps form. Polyps occupy space in the nose and create increased obstruction in addition to the other symptoms of allergy. New polyps occurring in acute allergic or inflammatory states are reversible. Polyps in chronic states develop perivenous fibrosis and seldom regress spontaneously.

Polyps arise from both allergy and inflammation but commonly from the coexistence of these irritants. Allergy results in bilateral involvement. Unilateral polyps of inflammatory origin usually are solitary, arise from the maxillary sinus, and appear at the choana. "Ball-valve" obstruction on expiration suggests this lesion. Large specimens may fill the nasopharynx and be seen in the mouth.

Multiple unilateral polyps are usually neoplastic. These lesions, the inverting papillomas, are of a low grade of malignancy. A strong tendency to recur makes aggressive treatment necessary.

Other Conditions. Granulomatous diseases, syphilis and tuberculosis, collagen disorders, and Wegener's granulomatosis produce localized swellings within the nose which eventually necrose. The initial obstruction persists as ulcers causing fetid discharge of bloody serous material and crusting. Pain is common. Destruction of cartilage may cause deformity.

The symptoms of malignancy mimic the granulomas in early stages, but as the lesions develop, deformity by swelling and ulceration of external surfaces is manifest. Malignancy in the sinus is silent in early stages. Roentgen examination showing bone destruction is an important clue.

Sarcoid and leukemoid states may infiltrate the nasal mucosa causing obstruction without other significant symptoms. Biopsy is usually necessary to differentiate the disorders that cause swelling in the nose. Hypometabolism causes nasal obstruction and thick secretion.

Drug-induced nasal obstructions result from the antitensive drugs and from overuse of topical vasoconstrictors. The patient with the latter condition is highly irritable, distraught, and reports use of spray or drops as often as every hour, day and night. He claims complete dependency on the drug and is reluctant to stop its use. He should have the help of a sedative while breaking the habit.

Pyocele and mucocele usually involve the frontal sinuses. They cause no symptoms other than insidious enlargement of the sinus by expansion of its walls. The orbital contents are commonly displaced downward and lateralward, because the thin bones of the floor of the frontal sinus and of the ethmoid plate are more readily displaced than is the thick anterior wall of the frontal sinus. Mucoceles in the ethmoid sinuses also expand into the nose.

Atrophic rhinitis is characterized by dryness of the nose and by dryness and thick secretions in the pharynx. Dry crusts may be present. The fetid infected crusts of ozena are rarely seen at the present time, probably due to the influence of antibiotics on underlying bacteria.

Foreign bodies cause fetid purulent discharge and pain. Diagnosis is confirmed

by probe or by inspection after use of vasoconstrictors.

TREATMENT

The treatment of rhinologic disease is both medical and surgical.

Medical. Infections respond to appropriate antibiotics, although the effective dosage and duration of treatment are greater than for the usual infection located within tissue. The treatment of allergies is not fully satisfactory. Elimination of the allergen is often impractical and hyposensitization ineffective. Antihistamine drugs are useful for acute manifestations but relatively ineffective in chronic states. Corticosteroids are useful for relief of chronic allergic disorders. Sustained action preparations in a dosage equivalent to 40 mg of prednisone given by intramuscular injection are effective for two to four months.

Surgical. Surgical treatment of sinusitis is limited to chronic conditions in which mucosal changes prevent ventilation and drainage. Chronic, obstructing nasal polyps usually must be removed. Because the polyps often originate within the sinuses, effective removal requires opening of the sinuses.

Malformations and deformities are treated by surgery, when this is feasible.

SUMMARY

The nose does not create a wide variety of symptoms; nevertheless, variations in the presence and degree of the symptoms of obstruction, discharge, pain, odor, bleeding, and hyposmia provide valuable aid in the diagnosis and evaluation of nasal disorders. □

705 Juniper Street, Atlanta, Georgia 30308

CLINICAL ANESTHESIA FOR GENERAL PRACTITIONERS

April 12th - 16th, 1971 **University of Oklahoma Medical Center**

Oklahoma City, Oklahoma

Sponsored by the Department of Anesthesiology, University of Oklahoma Medical Center, a four-day course in "Clinical Anesthesia for General Practitioners" will be offered April 12th-16th, 1971.

Enrollment in the course is limited by available clinical facilities. The total fee is $100.00. Applicants will be accepted for enrollment primarily on the basis of the sequence of arrival of the completed application forms, which may be ordered from the Department of Anesthesiology at the medical center. Registration forms must be submitted with a deposit of $25.00 (refundable prior to April 1st). Remainder of the tuition ($75.00) must be submitted by March 24th.

This course is limited in enrollment to physicians who are not specialists in anesthesiology but whose practice currently includes the administration of anesthesia.

Books As Clinical Tools

An Annotated Book List for Physicians

KELLY M. WEST, M.D.
RUTH W. WENDER, M.L.S.*

In previous issues of this feature it has been argued that "targeted" reading, relating directly to specific clinical problems, is the most effective means for furthering continuing education and improving care of patients. Because the practitioner can read only a tiny fraction of the vast medical literature, the process of selection is of critical importance. He must be able to retrieve promptly information which is current, concise, clear and correct. In deploying the limited budgets of his hospital and personal libraries, he must identify those volumes which will have maximum relevance for his specific needs. A variety of mechanisms are available to help him in the selection process including book displays of libraries and publishers, mailed advertisements, book reviews in journals, etc. Because none of these mechanisms have been entirely satisfactory, several lists have been developed recently to assist physicians, librarians, and other health professionals in selecting books.

The Majors Company has recently published a useful list that includes the recent medical books of the major publishers.[1] This list covers medical sciences as well as medical practice. It is very long and unselected, but it is well-organized by subject and author. Only a few of the most important recent publications have been omitted. The *Physician's Book Compendium* lists more than 10,000 medical books.[2] Very few important books are omitted. The titles are arranged by medical specialty and subspecialty. Within each subspecialty the books are listed by author or editor, and there is a complete author index at the back of the Compendium. A brief description (uncritical) is provided for about half of the books listed. The publisher hopes to issue annual volumes of this Compendium. The well-selected "Brandon list" is up-dated regularly and published periodically by the *Bulletin of the Medical Library Association*.[3] The most recent publication was in 1969, but a new list will appear in the April, 1971 issue of the Bulletin. The Brandon list is an excellent one, organized by both subject and author, containing about 400 book titles and a core list of 135 journals.

*Coordinator, Library and Information Services Project, Oklahoma Regional Medical Program.
One of a series sponsored by the Department of Continuing Education, University of Oklahoma Medical Center.

Asterisks indicate key books which might be selected by a library with a very limited budget. The "New England list" is also a good one.[4] This is a very select list containing only 105 book titles and a core list of 75 journals. The articles containing the New England and Brandon lists also provide additional information on other lists and sources concerning books, journals, and reference volumes for physicians, nurses, and hospital librarians.

The Oklahoma Regional Medical Program and the Department of Continuing Education of the University of Oklahoma School of Medicine published a book list (West and Smith) in this Journal in February of 1969.[5] In certain respects this "Oklahoma list" was similar to the Brandon list (April, 1969) and the New England list (February, 1969) which were published at the same time. The Oklahoma list was, however, conceived to serve a somewhat more specific purpose than these and other previous lists. The Brandon and New England lists, for example, take into account the information needs of all health professionals in hospitals including hospital administrators, nurses, and technicians. The Oklahoma lists of 1969 and 1971 were designed only for physicians, and they contain no information on journals except in relation to some indexes such as the *Cumulated Index Medicus* and *Current Medical References*. Selection of titles was based on a single criterion: The potential utility of the book in furthering patient-centered scholarship of practicing physicians. For example, the Oklahoma list has little in basic science *per se* (e.g., no basic texts in physiology, genetics, histology, embryology, or statistics). Omissions are not the results of our failure to recognize the importance of basic science; rather they reflect a priority for those books most likely to be used in solving specific clinical problems. It may be noted, however, that pharmacology, pathology and anatomy (under surgery) texts are included because of their immediate relevance to clinical medicine.

The purpose of this column is to up-date the 1969 Oklahoma lists of clinical references. We hope this new list will serve several purposes. A major objective will be to assist small libraries in selecting books to be used by practicing physicians. Even larger libraries may find it helpful as a check list. It has several titles not on the longer forthcoming Brandon list, and many that are not on the highly select New England list. The 1971 Brandon list will, however, have most of these Oklahoma list titles, plus many additional ones relating to the allied health professions and the basic sciences. The organization of subject headings of the Brandon list is more in keeping with standard library practice than ours. The Oklahoma list (below) is organized for the clinician, mainly by specialty and subspecialty. For example, anatomy books are listed under surgery and biochemistry books under laboratory medicine. We believe the cross-reference guides will make the list easy to use. For example, the reader who looks for renal disease will find a subject entry referring him to kidney disease and urology. Finally, we have interjected within the list brief comments designed to help the librarian, the library committee, or the practitioner in deciding which of these books to acquire under various circumstances. The comments relate to prices, characteristics of the books, their similarities, differences, etc.

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2. Celnik, Max (Editor): Physician's Book Compendium. New York, Physician's Book Compendium, 1969.
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4. Stearns, Norman S., and Ratcliff, Wendy W.: An Integrated Health-Science Core Library for Physicians, Nurses, and Allied Health Practitioners in Community Hospitals. New Eng. J. Med. 283: 1489-1498, December 31, 1970.
5. West, Kelly M., and Smith, Patricia: Books as Clinical Tools. Your Working Library. J. Okla. Med. Assn. 62: 63-65, February, 1969.

ACID-BASE BALANCE (See fluids and electrolytes)

ALLERGY AND IMMUNOLOGY

Criep, Leo H.: *Clinical Immunology and Allergy*. 2d ed. New York, Grune & Stratton, 1969. $35.00.

Gell, Philip, and Coombs, R. R. A. (Editors): *Clinical Aspects of Immunology*. 2d ed. Philadelphia, Davis, 1968. $26.00.

Samter, Max, and Alexander, Harry L. (Editors): *Immunological Diseases*. 2d ed. Boston, Little, Brown, 1971. In preparation. (First edition was 1965.)

Sheldon, John M., *et al.: A Manual of Clinical Allergy*. 2d ed. Philadelphia, Saunders, 1967. $16.00.

Turk, J. L.: *Immunology in Clinical Medicine.* New York and London, Appleton-Century-Crofts, 1969. $6.75.

Comment: A core list should contain at least one book on clinical allergy. Sheldon's book is probably the best bargain for nonallergists. Because of the increasing importance of clinical immunology a second book in this field would be useful. We have no strong preference among Criep, Gell, Samter, or Turk. They cover a similar scope and all are good. If the new edition of Samter comes out in 1971, it will be first choice in most situations.

ANATOMY (See surgery)

ANESTHESIOLOGY

Collins, Vincent J.: *Principles of Anesthesiology.* Philadelphia, Lea & Febiger, 1966. $35.00.

Wylie, William D., and Churchill-Davidson, Harry C.: *A Practice of Anesthesia.* 2d ed. Chicago, Year Book, 1966. $32.50.

Comment: The New England list recommends Wylie. Both Wylie and Collins are good and similar in scope.

ARTHRITIS AND RHEUMATISM

Hollander, Joseph Lee (Editor): *Arthritis and Allied Conditions; a Textbook of Rheumatology.* 7th ed. Philadelphia, Lea & Febiger, 1966. $32.50.

Copeman, W. S. C.: *Textbook of the Rheumatic Diseases.* 4th ed. E. & S. Livingstone Ltd., Edinburgh and London, 1969. $32.50.

Comment: Our first choice is Hollander.

CANCER

Ackerman, Lauren V., and Del Regato, J. A.: *Cancer: Diagnosis, Treatment, and Prognosis.* 4th ed. St. Louis, Mosby, 1970. $39.50.

Brodsky, Isadore (Editor): *Cancer Chemotherapy; Basic and Clinical Applications.* New York, Grune & Stratton, 1967. $21.00.

Cole, Warren H. (Editor): *Chemotherapy of Cancer.* Philadelphia, Lea & Febiger, 1970.

Greenwald, Edward S.: *Cancer Chemotherapy.* Flushing, N. Y., Medical Examination, 1967. $8.00.

Moore, Condict: *Synopsis of Clinical Cancer.* 2d ed. St. Louis, Mosby, 1970. $11.75.

Comment: Ackerman's excellent volume has the broadest coverage. Moore's book is good also; less detailed and cheaper.

CARDIOVASCULAR DISEASES

Bellet, Samuel: *Clinical Disorders of the Heart Beat.* 3d ed. Philadelphia, Lea & Febiger, 1971. In preparation.

Fowler, Noble O.: *Cardiac Diagnosis.* New York, Harper & Row, 1968. $23.50.

Friedberg, Charles K.: *Diseases of the Heart.* 3rd ed. Philadelphia, Saunders, 1966. $22.00.

Hurst, J. Willis, and Logue, R. Bruce: *The Heart: Arteries and Veins.* 2d ed. New York, McGraw-Hill, 1970. $32.50.

Meltzer, Lawrence, *et al.: Intensive Coronary Care.* Philadelphia, Charles Press, 1968. $6.00.

Pickering, George: *High Blood Pressure.* 2d ed. New York, Grune & Stratton, 1968. $16.00.

Richards, Robert L.: *Peripheral Arterial Disease.* Baltimore, Williams & Wilkins, 1970.

Stephenson, Hugh E.: *Cardiac Arrest and Resuscitation.* 3d ed. St. Louis, Mosby, 1969. $29.50.

Toole, James F., *et al.: Cerebral Vascular Disease.* New York, Grune & Stratton, 1969. $8.75.

Comment: A small core library might choose either Friedberg or Hurst. Hurst (1970) is slightly more recent than the excellent book of Friedberg (1966).

DERMATOLOGY

Andrews, George C., and Domonkos, Anthony N.: *Diseases of the Skin.* 6th ed. Philadelphia, Saunders, 1971. In preparation.

Lewis, George M., and Wheeler, Clayton E.: *Practical Dermatology.* 3d ed. Philadelphia, Saunders, 1967. $13.50.

Rook, A., *et al.* (Editors): *Textbook of Dermatology.* 2d ed. Philadelphia, F. A. Davis, 1968. 2 vols. $69.00.

Stuart, William D., *et al.: Synopsis of Dermatology.* 2d ed. St. Louis, Mosby, 1970. $13.85.

Comment: Rook is probably the most useful volume for dermatologists, but it is expensive. Most non-dermatologists would be satisfied with the information in Andrews or Stuart. The book of Lewis is our fourth choice, but it is a good inexpensive text. A new edition of Pillsbury is expected in a few months. It should be first-rate. (Pillsbury, Donald M., *et al.: A Manual of Dermatology.* Philadelphia, Saunders, 1971.)

DIAGNOSIS

Bauer, Julius: *Differential Diagnosis of Internal Diseases.* 3d ed. New York, Grune & Stratton, 1967. $32.00.

Conn, H. F., and Conn, R. B., Jr. (Editors): *Current Diagnosis.* 2 Philadelphia, Saunders, 1968. $21.75.

Cope, Zachary: *The Early Diagnosis of the Acute Abdomen.* 13th ed. New York, Oxford University Press, 1968. $6.00.

Douthwaite, Arthur H. (Editor): *French's Index of Differential Diagnosis.* 9th ed. Baltimore, Williams & Wilkins, 1967. $22.00.

Harvey, A. McGehee, and Bordley, James: *Differential Diagnosis; the Interpretation of Clinical Evidence.* 2d ed. Philadelphia, Saunders, 1970. $27.00.

Judge, Richard D., and Zuidema, George D. (Editors): *Physical Diagnosis; A Physiological Approach to the Clinical Examination.* 2d ed. Boston, Little, Brown, 1968. $12.50.

MacBryde, Cyril M., and Blacklow, Robert S. (Editors): *Signs and Symptoms; Applied Pathologic Physiology and Clinical Interpretation.* 5th ed. Philadelphia, Lippincott, 1970. $22.50.

Comment: MacBryde and Harvey would be our first choices for a general medical library with a limited budget. Cope's book is excellent in its field.

DIETETICS (See nutrition)

DRUGS (See pharmacology and therapeutics)

EMERGENCIES (See also cardiology, orthopedics, pharmacology and therapeutics [poisoning], surgery and others)

Brooks, D. K.: *Resuscitation.* Baltimore, Williams & Wilkins, 1967. $13.00.

Flint, Thomas, and Cain, Harvey D.: *Emergency Treatment and Management.* 4th ed. Philadelphia, Saunders, 1970. $11.50.

Henderson, John: *Emergency Medical Guide.* 2d ed. New York, McGraw-Hill, 1969. $7.95.

Schneewind, John H. (Editor): *Emergency Service Manual.* 2d ed. Chicago, Year Book, 1968. $5.00.

Comment: Flint and Cain is our first choice.

ELECTROCARDIOGRAPHY (See cardiovascular diseases)

ELECTROLYTES (See fluids and electrolytes)

ENDOCRINOLOGY AND METABOLISM

Bondy, Philip K. (Editor): *Duncan's Diseases of Metabolism: Detailed Methods of Diagnosis and Treatment.* 6th ed. Philadelphia, Saunders, 1969. 2 vols. $39.00.

Ellenberg, Max, and Rifkin, Harold (Editors): *Diabetes Mellitus; Theory and Practice.* New York, McGraw-Hill, 1970. $35.00.

Fajans, S. S., and Sussman, Karl (Editors): *Diabetes Mellitus; Diagnosis and Treatment,* Volume III. New York, American Diabetes Association, 1971. In preparation. About $5.00.

Hall, Reginald, *et al.: Clinical Endocrinology.* Philadelphia and Toronto, J. Lippincott Co., 1969. $20.00.

Marble, Alexander, *et al.: Joslin's Diabetes Mellitus.* 11th ed. Philadelphia, Lea & Febiger, 1971. In preparation.

Schneeberg, Norman G.: *Essentials of Clinical Endocrinology.* St. Louis, Mosby, 1970. $22.50.

Stanbury, John B.: *The Metabolic Basis of Inherited Disease.* 2d ed. New York, McGraw-Hill, 1966, $37.50.

Williams, Robert H. (Editor): *Textbook of Endocrinology.* 4th ed. Philadelphia, Saunders, 1968. $24.00.

Comment: The books of Williams and Bondy (Duncan's text) are outstanding and broad in scope. The others listed are also excellent but more narrow in their purposes. In diabetes, Marble's book is most detailed. Fajans' is briefest and Ellenberg's is intermediate. All three are good. The British books of Oakley and of Malins on diabetes are also good.

EYE DISEASES (See ophthalmology)

FLUIDS AND ELECTROLYTES

Black, Douglas: *Essentials of Fluid Balance.* 4th ed. Oxford, Blackwell Scientific, 1968. $5.50.

Goldberger, Emanuel: *A Primer of Water, Electrolyte and Acid-Base Syndromes.* 4th ed. Philadelphia, Lea & Febiger, 1970. $8.50.

Robinson, J. Roper: *Fundamentals of Acid-Base Regulation.* 3d ed. Philadelphia, Davis, 1967. $2.50.

Comment: Because it is the most recent, our choice is Goldberger. There is also much information on this field in the books listed under other subjects (e.g., kidney, endocrinology, surgery, etc.).

GASTROENTEROLOGY

Bockus, Henry L., *et al.: Gastroenterology.* 2d ed. Philadelphia, Saunders, 1963-65. 3 vols. Vol. 1, $26.00; Vol. 2, $29.00; Vol. 3, $31.00. (3 vols. $83.00).

Jones, Francis A., *et al.: Clinical Gastroenterology.* 2d ed. Philadelphia, Davis, 1968. $21.50.

Paton, A.: *Liver Disease.* Philadelphia, Lippincott, 1970. $7.25.

Paulson, Moses (Editor): *Gastroenterologic Medicine.* Philadelphia, Lea & Febiger, 1969. $60.00.

Schiff, Leon (Editor): *Diseases of the Liver.* 3d ed. Philadelphia, Lippincott, 1969. $39.50.

Sherlock, Sheila: *Diseases of the Liver and Biliary System.* 4th ed. Philadelphia, Davis, 1968. $18.50.

Spiro, Howard M.: *Clinical Gastroenterology.* New York, Macmillan, 1970. $35.00.

Truelove, S. C., and Reynell, P. C.: *Diseases of the Digestive System.* 2d ed. Philadelphia, Davis, 1970.

Comment: If a single volume is to be purchased, we recommend Spiro, which is very recent (1970). Paulson and Bockus are also good general references.

GENETICS (See endocrinology and metabolism)

GYNECOLOGY AND OBSTETRICS

Eastman, Nicholson J., and Hellman, Louis M. (Editors): *Williams' Obstetrics.* 14th ed. New York, Appleton, 1971. In preparation.

McLennan, Charles E.: *Synopsis of Obstetrics.* 8th ed. St. Louis, Mosby, 1970. $9.50.

Novak, Edmund R., *et al.: Textbook of Gynecology.* 8th ed. Baltimore, Williams & Wilkins, 1970. $22.50.

Philipp, Elllot E., *et al.* (Editors): *Scientific Foundations of Obstetrics and Gynecology.* Philadelphia, Davis, 1970. $30.00.

Taylor, E. S.: *Essentials of Gynecology.* 4th ed. Philadelphia, Lea & Febiger, 1969. $17.00.

Te Linde, Richard, and Mattingly, Richard F.: *Operative Gynecology.* 4th ed. Philadelphia, Lippincott, 1970. $35.00.

Comment: If budget limits selection to two books in a general medical library, we would recommend Novak and Eastman (Williams). Gynecologists might choose for their own use books such as Philipp or Te Linde that cover certain aspects in greater depth.

HEMATOLOGY

Britton, C. J. C. (Editor): *Whitby's Disorders of the Blood; Diagnosis, Pathology, Treatment, Technique.* 10th ed. New York, Grune & Stratton, 1969. $19.75.

Leavell, Byrd S., and Thorup, Oscar A.: *Fundamentals of Clinical Hematology.* 3d ed. Philadelphia, Saunders, 1971. In preparation.

Wintrobe, Maxwell M.: *Clinical Hematology.* 6th ed. Philadelphia, Lea & Febiger, 1967. $22.50.

Comment: Wintrobe's book is outstanding. The new edition of Leavell will be briefer than Wintrobe, an advantage in some situations, a disadvantage in others.

HEART (See cardiovascular diseases)

IMMUNOLOGY (See allergy and immunology)

INFECTIOUS DISEASES (See also pediatrics and pharmacology and therapeutics)

American Hospital Association: *Infection Control in the Hospital.* Chicago, A.H.A., 1968. $3.75.

Benenson, Abram S. (Editor): (American Public Health Association) *Control of Communicable Diseases in Man.* New York, American Public Health Association, 1970. $1.75.

Blair, John E., *et al.* (Editors): *Manual of Clinical*

Microbiology. Baltimore, Williams & Wilkins, 1970.

Bodily, Howard L.: *Diagnostic Procedures for: Bacterial, Mycotic and Parasitic Infections.* New York, American Public Health Association, 1970. $15.00.

Faust, Ernest C., *et al.: Craig and Faust's Clinical Parasitology.* 8th ed. Philadelphia, Lea & Febiger, 1970. $25.50.

Debre, Robert, and Celers, Josette (Editors): *Clinical Virology: Evaluation and Management of Human Viral Infections.* Philadelphia, Saunders, 1970. $37.00.

Emmons, Chester W., and Binford, Chapman H.: *Medical Mycology.* 2d ed. Philadelphia, Lea & Febiger, 1970. $16.50.

Kagan, Benjamin M.: *Antimicrobial Therapy.* Philadelphia, Saunders, 1970.

Smith, Hillas: *Antibiotics in Clinical Practice.* Baltimore, Williams & Wilkins, 1970. $11.75.

Swain, R. H., and Dodds, T. C.: *Clinical Virology.* Baltimore, Williams & Wilkins, 1967. $14.00.

Top, Franklin Henry: *Communicable and Infectious Diseases: Diagnosis, Prevention, Treatment.* 6th ed. St. Louis, Mosby, 1968. $18.75.

Comment: If budget is limited, we would recommend Top as first choice because its coverage is broad.

INTERNAL MEDICINE (General)

Beeson, Paul B., and McDermott, Walsh (Editors): *Cecil-Loeb Textbook of Medicine.* 13th ed. Philadelphia, Saunders, 1971. In preparation.

Krupp, Marcus A., *et al.: Current Diagnosis and Treatment.* rev. ed. Los Angeles, Lange, 1971. $11.00.

Davidson, Sir Leybourne S. P. (Editor): *The Principles and Practice of Medicine.* 9th ed. Baltimore, Williams & Wilkins, 1968. $11.75.

Harvey, A. McGehee, *et al.* (Editors): *Osler's Principles and Practice of Medicine.* 17th ed. New York, Appleton, 1968. $22.50.

Hunter, George William, *et al.: A Manual of Tropical Medicine.* 4th ed. Philadelphia, Saunders, 1966. $22.50.

Keefer, Chester F., and Wilkins, Robert W. (Editors): *Medicine: Essentials of Clinical Practice.* Boston, Little, Brown, 1970. Approximately $18.00.

Mann, W. N., and Lessof, M. H. (Editors): *Conybeare's Textbook of Medicine.* 15th ed. Baltimore, Williams & Wilkins, 1970. $20.75.

Sodeman, William A., and Sodeman, William A., Jr.: *Pathologic Physiology.* 4th ed. Philadelphia, Saunders, 1967. $19.00.

Wintrobe, Maxwell M., *et al.* (Editors): *Harrison's Principles of Internal Medicine.* 6th ed. New York, McGraw-Hill, 1970. $26.50.

Comment: Our first choice would be Cecil or Wintrobe (Harrison) depending on which has been issued most recently. At present this is Wintrobe (Harrison).

KIDNEY DISEASE (See also urology)

Black, Douglas Andrew Kilgour (Editor): *Renal Disease.* 2d ed. Philadelphia, Davis, 1967. $25.00.

De Wardener, H. E.: *The Kidney.* 3d ed. Boston, Little, Brown, 1968. $16.00.

Douglas, Adrian P., and Kerr, David: *A Short Textbook of Kidney Disease.* Philadelphia, Lippincott, 1968. $10.00.

Hamburger, Jean, *et al.* (Translated by Walsh, Anthony): *Nephrology.* Philadelphia, Saunders, 1968. 2 vols. $50.00.

Strauss, Maurice Benjamin, and Welt, Louis G. (Editors): *Diseases of the Kidney.* 2d ed. Boston, Little, Brown, 1971. In preparation.

Comment: Our first choice is Strauss.

LABORATORY MEDICINE

Bennington, James L., *et al.: Laboratory Medicine.* New York, Macmillan, 1970. $10.95.

Davidson, Israel, and Henry, John Bernard (Editors): *Todd-Sanford Clinical Diagnosis by Laboratory Methods.* 14th ed. Philadelphia, Saunders, 1969. $24.00.

Frankel, Sam, *et al.* (Editors): *Gradwohl's Clinical Laboratory Methods and Diagnosis; a Textbook on Laboratory Procedures and Their Interpretation.* 7th ed. Philadelphia, Lea & Febiger, 1969. $28.50.

Goodale, Raymond H., and Widmann, Frances K.: *Clinical Interpretation of Laboratory Tests.* 6th ed. Philadelphia, Davis, 1969. $11.50.

Hoffman, William S. (Editor): *The Biochemistry of Clinical Medicine.* 4th ed. Chicago, Year Book, 1970. $15.75.

Koepke, John A.: *Guide to Clinical Laboratory Diagnosis.* New York, Appleton, 1969. $6.75.

Levinson, Samuel Azor, and MacFate, Robert P.: *Clinical Laboratory Diagnosis.* 7th ed. Philadelphia, Lea & Febiger, 1969. $28.50.

Searcy, Roland L.: *Diagnostic Biochemistry.* New York, McGraw-Hill, 1969. $30.00.

Thompson, R. H. S., and King, E. J. (Editors): *Biochemical Disorders in Human Disease.* 3d. ed. London, Churchill, 1970. $28.00.

Comment: Not much to choose between several of these. If limited to one choice we would recommend Davidson or Goodale in most situations.

LUNG (See pulmonary diseases)

MEDICINE (See internal medicine)

METABOLISM (See endocrinology and metabolism)

MICROBIOLOGY (See infectious diseases)

NEUROLOGY AND NEUROSURGERY

Alpers, Bernard Jacob, and Mancall, Elliott L.: *Clinical Neurology.* 6th ed. Philadelphia, Davis, 1971. In preparation.

Bannister, Roger: *Clinical Neurology.* 3d ed. rev. New York, University, 1969. $13.50.

Gillingham, John F. (Editor): *Neurosurgery (Clinical Surgery,* vol. 16.) Philadelphia, Lippincott, 1970. $22.50.

Gilroy, John, and Meyer, John Sterling: *Medical Neurology.* New York, Macmillan, 1969. $16.00.

Grinker, Roy Richard, *et al.: Neurology.* 6th ed. Springfield, Illinois, Thomas, 1966. $33.50.

Kahn, Edgar A., *et al.: Correlative Neurosurgery.* 2d ed. Springfield, Illinois, Thomas, 1969. $31.50.

Kempe, Ludwig G.: *Operative Neurosurgery, Vol. 1: Cranial, Cerebral, and Vascular Disease.* New York, Springer, 1968. $39.50.

Kempe, Ludwig G., *Vol. II: Posterior Fossa, Spinal Cord, and Peripheral Nerve Disease.* New York, Springer. Price not set.

Merritt, H. Houston: *A Textbook of Neurology*. 4th ed. Philadelphia, Lea & Febiger, 1967. $15.00.

Watson, John Nicholas (Editor): *Brain's Diseases of the Nervous System*. 7th ed. New York, Oxford, 1969. $19.50.

Walshe, Francis Martin Rouse: *Diseases of the Nervous System*. 11th ed. Baltimore, Williams & Wilkins, 1970.

Comment: We have no strong preference among these neurology texts. In some circumstances we have recommended either Merritt or Watson (Brain). Kahn is a good general text on neurosurgery. Kempe's book will be of interest mainly to neurosurgeons.

NUCLEAR MEDICINE (See radiology)

NUTRITION

Davidson, Sir Stanley, and Passmore, R.: *Human Nutrition and Dietetics*. 4th ed. Baltimore, Williams & Wilkins, 1970. $20.00.

Mayo Clinic. *Diet Manual*. 4th ed. Philadelphia, Saunders, 1971. $6.75.

Wohl, Michael Gershon, and Goodhart, Robert S.: *Modern Nutrition in Health and Disease; Dietotherapy*. 4th ed. Philadelphia, Lea & Febiger, 1968. $30.00.

Comment: Our first choice is Wohl if a general text is needed. Davidson is also a good book.

OBSTETRICS (See gynecology and obstetrics)

ONCOLOGY (See cancer)

OPHTHALMOLOGY

Allen, James H. (Editor): *May's Manual of the Diseases of the Eye*. 24th ed. Baltimore, Williams & Wilkins, 1968. $9.75.

Duke-Elder, Stewart (Editor): *Parson's Diseases of the Eye*. 15th ed. London, Churchill, 1970.

Newell, Frank W.: *Ophthalmology: Principles and Concepts*. 2d ed. St. Louis, Mosby, 1969. $16.75.

Scheie, Harold G., and Albert, Daniel M. (Editors): *Adler's Textbook of Ophthalmology*. 8th ed. Philadelphia, Saunders, 1969. $17.50.

Vaughan, Daniel, *et al.*: *General Ophthalmology*. 5th ed. Los Altos, California, Lange, 1968. $6.50.

Comment: For the nonophthalmologist our first choice would be Newell. Any of these five would serve well as a general reference volume.

ORTHOPEDICS

Adams, John Crawford: *Outline of Orthopaedics*. 6th ed. Baltimore, Williams & Wilkins, 1967. $9.75.

Aegerter, Ernest Emil, and Kirkpatrick, John A.: *Orthopedic Diseases; Physiology, Pathology, Radiology*. 3d ed. Philadelphia, Saunders, 1968. $23.00.

American College of Surgeons, Committee on Trauma: *Early Care of the Injured Patient*. 3d ed. Philadelphia, Saunders, 1971. In preparation.

Crenshaw, A. H. (Editor): *Campbell's Operative Orthopaedics*. 5th ed. St. Louis, Mosby, 1971. In preparation.

De Palma, Anthony Frederick: *The Management of Fractures and Dislocations; an Atlas*. 2d ed. Philadelphia, Saunders, 1970. 2 Vols. $52.00.

Lichtenstein, Louis: *Diseases of Bone and Joints*. St. Louis, Mosby, 1970. $19.75.

O'Donoghue, D. H.: *Treatment of Injuries to Athletes*. 2d ed. Philadelphia, Saunders, 1970.

Ralston, Edgar Lee: *Handbook of Fractures*. St. Louis, Mosby, 1967. $13.75.

Shands, Alfred Rives, *et al.*: *Handbook of Orthopaedic Surgery*. 7th ed. St. Louis, Mosby, 1967. $12.50.

Turek, Samuel L.: *Orthopaedics; Principles and Their Application*. 2d ed. Philadelphia, Lippincott, 1967. $27.00.

Comment: For the nonorthopedist probably Shands would be most useful. Orthopedists as a group express no strong preferences among the other books listed here.

OTORHINOLARYNGOLOGY

Ballenger, Howard Charles, *et al.*: *Diseases of the Nose, Throat and Ear*. 11th ed. Philadelphia, Lea & Febiger, 1969. $35.00.

Boies, Laurence R., *et al.*: *Fundamentals of Otolaryngology; a Textbook of Ear, Nose and Throat Diseases*. 4th ed. Philadelphia, Saunders, 1965. $9.50.

De Weese, David Downs, and Saunders, William H.: *Textbook of Otolaryngology*. 3d ed. St. Louis, Mosby, 1968. $13.75.

Comment: No strong preference here. Brandon recommends DeWeese as first choice.

PATHOLOGY (See also laboratory medicine)

Ackerman, Lauren Vedder, and Butcher, Harvey R.: *Surgical Pathology*. 2d ed. St. Louis, Mosby, 1968. $29.75.

Anderson, William Arnold Douglas: *Pathology*. 6th ed. St. Louis, Mosby, 1971. In preparation.

Boyd, William: *A Textbook of Pathology*. 8th ed. Philadelphia, Lea & Febiger, 1970. $18.00.

Florey, Lord H. (Editor): *General Pathology*. 4th ed. Philadelphia, Saunders, 1970. $24.00.

Miller, Seward Elmore (Editor): *A Textbook of Clinical Pathology*. 7th ed. Baltimore, Williams & Wilkins, 1966. $17.00.

Robbins, Stanley L.: *Pathology*. 3d ed. Philadelphia, Saunders, 1967. $20.50.

Wells, Benjamin Baxter, and Halsted, James A.: *Clinical Pathology; Interpretation and Application*. 4th ed. Philadelphia, Saunders, 1967. $11.50.

Comment: For general reference we would recommend as first choice Boyd or Robbins, but others listed are also good.

PEDIATRICS

Arena, Jay M. (Editor): *Devidson's Compleat Pediatrician*. 9th ed. Philadelphia, Lea & Febiger, 1969. $19.50.

Barnett, Henry L., and Einhorn, Arnold H.: *Pediatrics*. 14th ed. New York, Appleton, 1968. $24.50.

Cooke, Robert E.: *The Biologic Basis of Pediatric Practice*. New York. McGraw-Hill, 1968. $24.50.

Craig, William Stuart McRae, *et al.*: *Care of the Newly Born Infant*. 4th ed. Baltimore, Williams & Wilkins, 1969. $11.00.

Ellis, Richard W., and Mitchell, R. G.: *Diseases in Infancy and Childhood*. 6th ed. Baltimore, Williams & Wilkins, 1968. $13.50.

Gellis, Sydney Saul, and Kagan, Benjamin M. (Editors): *Current Pediatric Therapy*. 4th ed. Philadelphia, Saunders, 1970. $27.00.

Illingworth, Ronald Stanley: *The Normal Child; Some Problems of the First Five Years and Their*

Treatment. 4th ed. Baltimore, Williams & Wilkins, 1968. $9.50.

Krugman, Saul, and Ward, Robert: *Infectious Diseases of Children.* 4th ed. St. Louis, Mosby, 1968. $18.75.

McCammon, R. W.: *Human Growth and Development.* Springfield, Illinois, Thomas, 1970. $9.00.

Nelson, Waldo Emerson, *et al.: Textbook of Pediatrics.* 9th ed. Philadelphia, Saunders, 1969. $21.50.

Shirkey, Harry C. (Editor): *Pediatric Therapy.* 3d ed. St. Louis, Mosby, 1968. $25.00.

Silver, Henry K.: *Handbook of Pediatrics.* 8th ed. Los Altos, California, Lange, 1969. $6.00.

Varga, Charles: *Handbook of Pediatric Medical Emergencies.* 4th ed. St. Louis, Mosby, 1968. $19.75.

Comment: Barnett and Nelson are the standard comprehensive references. Arena is slightly more succinct and also good.

PERIPHERAL VASCULAR DISEASES (See cardiovascular diseases)

PHARMACOLOGY AND THERAPEUTICS

Arena, Jay M.: *Poisoning; Toxicology—Symptoms—Treatments.* 2d ed. Springfield, Illinois, Thomas, 1970. $43.50.

Chatton, Milton J., *et al.: Handbook of Medical Treatment.* 12th ed. Los Altos, California, Lange, 1970. $6.50.

Conn, Howard F.: *Current Therapy, 1971.* Philadelphia, Saunders, 1971. In preparation.

Dilling, Walter James: *Clinical Pharmacology.* 22d ed. Baltimore, Williams & Wilkins, 1969. $7.25.

DiPalma, Joseph R. (Editor): *Drill's Pharmacology in Medicine.* 4th ed. New York, McGraw-Hill, 1971. In preparation.

Dreisbach, Robert Hastings: *Handbook of Poisoning.* 6th ed. Los Altos, California, Lange, 1969. $6.00.

Friend, Dale G.: *Drug Therapy.* Chicago, Year Book Medical. $13.00.

Garrod, Lawrence P., and O'Grady, Francis: *Antibiotic and Chemotherapy.* 2d ed. Baltimore, Williams & Wilkins, 1968. $12.00.

Gleason, Marion N., *et al.: Clinical Toxicology of Commercial Products.* 3d ed. Baltimore, Williams & Wilkins, 1969. $24.50.

Goodman, Louis Sanford, and Gilman, Alfred: *The Pharmacological Basis of Therapeutics.* 4th ed. New York, Macmillan, 1970. $24.50.

Grollman, Arthur, and Grollman, Evelyn Frances: *Pharmacology and Therapeutics.* 7th ed. Philadelphia, Lea & Febiger, 1970. $19.50.

Kaye, Sidney: *Handbook of Emergency Toxicology; a Guide for the Identification, Diagnosis, and Treatment of Poisoning.* 3d ed. Springfield, Illinois, Thomas, 1970. $22.00.

Krantz, John Christian, *et al.: The Pharmacologic Principles of Medical Practice.* 7th ed. Baltimore, Williams & Wilkins, 1969. $15.50.

Modell, Walter (Editor): *Drugs of Choice—1970-1971.* St. Louis, Mosby, 1970. $19.75.

Physicians Desk Reference to Pharmaceutical Specialties and Biologicals. Annual. Medical Economics, Oradell, New Jersey. $11.00, 1971.

Smith, Jay W. (Editor): *Manual of Medical Therapeutics.* 19th ed. Boston, Little, Brown. $5.95.

Comment: For a general reference work we recommend Goodman as first choice, but others of this type (e.g. Krantz, Dilling, Grollman) are also good. The *P.D.R.* and Conn's *Current Therapy* are justifiably popular because they are so easy to use and so frequently consulted.

PHYSICAL DIAGNOSIS (See diagnosis)

PHYSICAL MEDICINE AND REHABILITATION

Homburger, Freddy, and Bonner, Charles D.: *Medical Care and Rehabilitation of the Aged and Chronically Ill.* 2d ed. Boston, Little, Brown, 1964. $9.50.

Krusen, Frank Hammond (Editor): *Handbook of Physical Medicine and Rehabilitation.* 2d ed. Philadelphia, Saunders, 1971. In preparation.

Licht, Sidney: *Rehabilitation and Medicine.* New Haven, Licht, 1968. $20.00.

Rusk, Howard A.: *Rehabilitation Medicine; a Textbook on Physical Medicine and Rehabilitation.* 3d ed. St. Louis, Mosby, 1971. In preparation.

Comment: No strong preference here. If a single selection must be made, Rusk or Krusen would probably be preferable in most small hospitals in so far as reference needs of physicians are concerned.

POISONING (See pharmacology and therapeutics)

PREVENTIVE MEDICINE AND PUBLIC HEALTH

Clark, Duncan W., and MacMahon, Brian (Editors): *Preventive Medicine.* Boston, Little, Brown, 1967. $14.95.

Hobson, William (Editor): *The Theory and Practice of Public Health.* 3d ed. New York, Oxford University Press, 1969. $27.50.

Kilbourne, Edwin A., and Smillie, Wilson G. (Editors): *Human Ecology and Public Health.* 4th ed. New York, Macmillan, 1969. $11.95.

Comment: Most clinicians would probably find Clark the most useful. A new edition of Sartwell is expected in 1972. (Sartwell, Philip [Editor]: *Roseneau's Preventive Medicine and Public Health.* 9th ed. New York, Appleton, 1965. $24.50.)

PSYCHIATRY

Freedman, Alfred M., and Kaplan, Harold I. (Editors): *Comprehensive Textbook of Psychiatry.* Baltimore, Williams & Wilkins, 1967. $24.75.

Kolb, Lawrence Coleman (Editor): *Noyes' Modern Clinical Psychiatry.* 7th ed. Philadelphia, Saunders, 1968. $11.00.

Redlich, Frederick Carl, and Freedman, Daniel X.: *The Theory and Practice of Psychiatry.* New York, Basic Books, 1966. $12.50.

Comment: If a single volume is to be acquired we have no preference among these three.

PUBLIC HEALTH (See preventive medicine and public health)

PULMONARY DISEASES (including thoracic surgery)

Bates, David V., *et al.: Respiratory Function in Disease; an Introduction to the Integrated Study of the Lung.* 2d ed. Philadelphia, Saunders, 1971. In preparation.

Baum, Gerald L. (Editor): *A Textbook of Pulmonary*

Disease. 2d ed. Boston, Little, Brown, 1971. In preparation.

Blades, Brian Brewer (Editor): *Surgical Diseases of the Chest.* 2d ed. St. Louis, Mosby, 1966. $28.50.

Crofton, John, and Douglas, Andrew: *Respiratory Diseases.* Philadelphia, Davis, 1969. $27.50.

Fraser, R. G., and Pare, J. P.: *Diagnosis of Diseases of the Chest.* Philadelphia, Saunders, 1970. $48.00.

Gibbon, John H., *et al.: Surgery of the Chest.* 2d ed. Philadelphia, Saunders, 1969. $32.50.

Hinshaw, Horton Corwin, and Garland, L. H.: *Diseases of the Chest.* 3d ed. Philadelphia, Saunders, 1969. $25.00.

Lindskog, Gustaf E.: *Thoracic and Cardiovascular Surgery with Related Pathology.* 3d ed. New York, Appleton. In preparation.

Comment: Our first choice as general reference source is Hinshaw. Baum is also good. It probably will be first choice when the 1971 edition appears.

RADIOLOGY AND NUCLEAR MEDICINE

Blahd, William H. (Editor): *Nuclear Medicine.* 2d ed. New York, McGraw-Hill, 1971. In preparation.

Maynard, C. Douglas: *Clinical Nuclear Medicine.* Philadelphia, Lea & Febiger, 1969. $12.50.

Meschan, Isadore: *Roentgen Signs in Clinical Practice.* Philadelphia, Saunders, 1966. 2 Vols. $38.00.

Moss, William T., and Brand, William N.: *Therapeutic Radiology; Rationale, Technique, Results.* 3d ed. St. Louis, Mosby, 1969. $24.50.

Paul, Lester W., and Juhl, John H.: *Essentials of Roentgen Interpretation.* 2d ed. New York, Harper & Row, 1965. $30.00.

Sutton, David: *A Textbook of Radiology.* Baltimore, Williams & Wilkins, 1969. $42.50.

Wagner, Henry N.: *Principles of Nuclear Medicine.* Philadelphia, Saunders, 1968. $27.50.

Comment: For diagnostic radiology the New England list recommends Paul. We recommend Moss for therapeutics and either Wagner or Bland for nuclear medicine.

RENAL DISEASES (See kidney diseases)

RHEUMATOLOGY (See arthritis and rheumatism)

SKIN (See dermatology)

SURGERY, GENERAL

American College of Surgeons. Committee on Pre and Post Operative Care: *Manual of Preoperative and Postoperative Care.* 2d ed. Philadelphia, Saunders, 1972. In preparation. (1st ed. 1967, $8.50.)

Artz, Curtis Price, and Hardy, James D. (Editors): *Complications in Surgery and Their Management.* 2d ed. Philadelphia, Saunders, 1967. $24.00.

Ballinger, Walter F., *et al.* (Editors): *The Management of Trauma.* Philadelphia, Saunders, 1968. $25.00.

Boyes, Joseph H. (Editor): *Bunnell's Surgery of the Hand.* 5th ed. Philadelphia, Lippincott, 1970. $34.00.

Cole, Warren H., and Zollinger, Robert M. (Editors): *Textbook of Surgery.* 9th ed. New York, Appleton, 1970. Text, $25.00; paper, $14.75.

Cooper, Phillip (Editor): *The Craft of Surgery.* 2d ed. Chicago, Little, Brown, 3 Vols. In preparation.

Davis, Loyal (Editor): *Christopher's Textbook of Surgery.* 9th ed. Philadelphia, Saunders, 1968. $21.50.

Dunphy, J. E., and Botsford, T. W.: *Physical Examination of the Surgical Patient.* 3d ed. Philadelphia, Saunders, 1964. $8.50. (4th ed. in preparation; due 1973.)

Goss, Charles Mayo (Editor): *Gray's Anatomy of the Human Body.* 28th ed. Philadelphia, Lea & Febiger, 1966. $22.50.

Hollinshead, William Henry: *Textbook of Anatomy.* 2d ed. New York, Harper & Row, 1967. $18.75.

Jones, Peter: *Clinical Pediatric Surgery: Diagnosis and Management.* Philadelphia, Davis, 1970. $15.00.

Maingot, Rodney: *Abdominal Operations.* 5th ed. New York, Appleton, 1969. 2 Vols. $45.50.

Rhoads, Jonathan E., *et al.* (Editors): *Surgery: Principles and Practice.* 4th ed. Philadelphia, Lippincott, 1970. $24.00. (J. Gallen's name appeared first on 1st-2nd editions, C. A. Moyer's on 3d.)

Shackelford, Richard T.: *Diagnosis of Surgical Disease.* Philadelphia, Saunders, 1968. 3 Vols. $72.50.

Schwartz, Seymour I., *et al.* (Editors): *Principles of Surgery.* New York, McGraw-Hill, 1969. Vol. I, $24.50; Vol. II. $29.50.

Comment: Our first choice as a general reference is Schwartz. The books of Rhoads and Cole are also recent, good and broad in coverage.

THERAPEUTICS (See pharmacology and therapeutics)

TOXICOLOGY (See pharmacology and therapeutics)

UROLOGY

Campbell, Meredith Fairfax, and Harrison, J. H. (Editors): *Urology.* 3d ed. Philadelphia, Saunders, 1970. 3 Vols. $110.00.

Dodson, Austin I.: *Urological Surgery.* 4th ed. St. Louis, Mosby, 1970. $32.50.

Glenn, James F., and Boyce, William H. (Editors): *Urologic Surgery.* New York, Harper & Row, 1969. $35.00.

Smith, Donald R.: *General Urology.* 6th ed. Los Altos, California, Lange, 1969. $8.00.

Comment: Campbell is best for the urologist because of its completeness but is quite expensive. For the nonurologist, Smith is a good, briefer and less expensive volume. For surgeons, Dodson and Glenn are useful references of comparable scope and quality.

X-RAY (See radiology)

OTHER GENERAL REFERENCE VOLUMES

Chatton, Milton J., and Sanazaro, Paul J. (Editors): *Current Medical References.* 6th ed. Los Altos, California, Lange, 1970. $12.00.

Cooper, Philip: *Ward Procedures and Techniques.* New York, Appleton, 1967. $6.75.

Dorland's Medical Dictionary. 24th ed. Philadelphia, Saunders, 1965. $13.00. (A comparable publication is *Stedman's Medical Dictionary.* 21st ed. Baltimore, Williams & Wilkins, 1966. $14.00)

Fisher, J. C.: *Clinical Procedures: A Concise Guide for Students of Medicine.* Baltimore, Williams & Wilkins, 1970. $3.95.

Jablonski, Stanley R.: *Dictionary of Eponymic Syndromes and Diseases.* Philadelphia, Saunders, 1969. $12.75.

List of journals available in nearest back-up medical library.

Merck, Sharp, & Dohme Research Laboratories: *The Merck Manual of Diagnosis and Therapy.* 11th ed. Rahway, New Jersey, Merck, 1966. $7.50.

National Library of Medicine: *Abridged Index Medicus* (monthly and annual cumulation). Washington, Government Printing Office. Monthly, $12 per year; cumulation, estimated $10.00.

National Library of Medicine: *Index Medicus* (monthly and annual cumulation). Washington, Government Printing Office. Monthly, $63 per year; cumulation, $90.50.

Comment: Insta-dex, a monthly publication of United Medical Laboratories, Inc., P. O. Box 3932, Portland, Oregon, edited by R. S. Scharffenberg is similar to the *Abridged Index Medicus.* In some respects it is better because it covers 145 journals. On the other hand it is not cumulated, while the *Abridged Index Medicus* is. However, *Insta-dex* has announced a forthcoming annual cumulation of its index section only, which should add to its usefulness. Generally, the cumulated indexes are more useful than the monthly issues so we sometimes advise small libraries to buy only the *Cumulated Index Medicus* and/or the *Abridged Index Medicus* and the *Cumulated Abridged Index Medicus.*

ATTENTION—

ALL COUNTY MEDICAL SOCIETIES

Resolutions to be submitted to the House of Delegates during the 1971 Annual Meeting in Tulsa must be received in the OSMA Headquarters no later than March 29th, 1971.

Address your resolutions to Oklahoma State Medical Association, 601 N.W. Expressway, Oklahoma City, Oklahoma 73118.



Campbell's Soups... wide variety...for limited appetites

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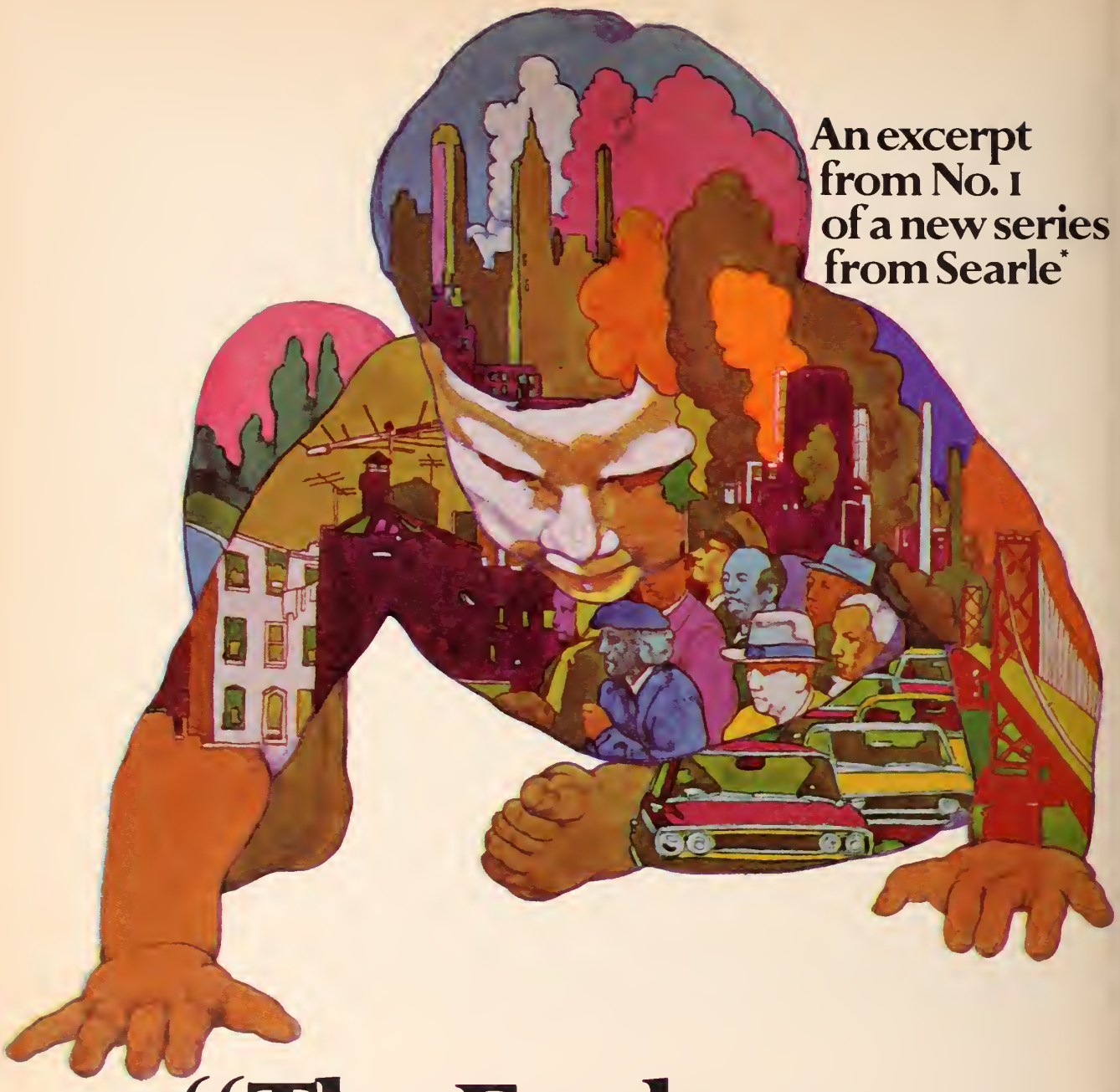


Nourishment Campbell's Soups contain selected meats and sea foods, best garden vegetables—carefully processed to help retain their natural flavors and nutritive values.

Convenience Within 4 minutes a bowl of delicious soup is heated and ready to eat.

Economy Campbell's Soups are inexpensive—an important consideration to those whose budgets are limited.

Recommend Campbell's Soups . . . and, of course, enjoy them yourself. Remember, *there's a soup for almost every patient and diet . . . and for every meal.*



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75 million more Americans—what impact on health care?

Because of a declining birthrate in the United States—attributable in no small measure to the widespread use of contraceptives—our population in thirty years is expected to be *only* 280 million, while the world population is expected to double, reaching 7 billion.

But the word "only" has an ironic ring to ecologists who warn of cities resembling overcrowded, contaminated rat colonies, of respiratory and mental diseases reaching epidemic proportions and of a health-care community virtually overwhelmed by the burden.

The global consequences may be no less devastating. Ecologists estimate that every American has roughly fifty times the negative impact on the Earth's life-support systems of, say, a citizen of India. In these terms, adding 75 million Americans would be equivalent to adding 3.7 billion Indians to the world population.

**For the complete brochure, and others in the series as they appear, please write to Searle or ask your Searle representative.* Explored in the forthcoming issues will be the role of birth control on family pressures and its effects on the family; the influences of poverty, ethnic factors and marital status; its role in illness, its genetic implications and its effects on the emotional and behavioral life of the individual.

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Actions — Demulen acts to prevent ovulation by inhibiting the output of gonadotropins from the pituitary gland. Demulen depresses the output of both the follicle-stimulating hormone (FHS) and the luteinizing hormone (LH).

Special note: Oral contraceptives have been marketed in the United States since 1960. Reported pregnancy rates vary from product to product. The effectiveness of the sequential products appears to be somewhat lower than that of the combination products. Both types provide almost completely effective contraception.

An increased risk of thromboembolic disease associated with the use of hormonal contraceptives has now been shown in studies conducted in both Great Britain and the United States. Other risks, such as those of elevated blood pressure, liver disease and reduced tolerance to carbohydrates, have not been quantitated with precision.

Long-term administration of both natural and synthetic estrogens in subprimate animal species in multiples of the human dose increases the frequency of some animal carcinomas. These data cannot be transposed directly to man. The possible carcinogenicity due to the estrogens can be neither affirmed nor refuted at this time. Close clinical surveillance of all women taking oral contraceptives must be continued.

Indication — Demulen is indicated for oral contraception.

Contraindications — Patients with thrombophlebitis, thromboembolic disorders, cerebral apoplexy or a past history of these conditions, markedly impaired liver function, known or suspected carcinoma of the breast, known or suspected estrogen-dependent neoplasia and undiagnosed abnormal genital bleeding.

Warnings — The physician should be alert to the earliest manifestations of thrombotic disorders (thrombophlebitis, cerebrovascular disorders, pulmonary embolism and retinal thrombosis). Should any of these occur or be suspected the drug should be discontinued immediately.

Retrospective studies of morbidity and mortality conducted in Great Britain and studies of morbidity in the United States have shown a statistically significant association between thrombophlebitis, pulmonary embolism, and cerebral thrombosis and embolism and the use of oral contraceptives. There have been three principal studies in Britain [1-3] leading to this conclusion, and one[4] in this country. The estimate of the relative risk of thromboembolism in the study by Vessey and Doll[3] was about sevenfold, while Sartwell and associates[4] in the United States found a relative risk of 4.4, meaning that the users are several times as likely to undergo thromboembolic disease without evident cause as nonusers. The American study also indicated that the risk did not persist after discontinuation of administration, and that it was not enhanced by long-continued administration. The American study was not designed to evaluate a difference between products. However, the study suggested that there might be an increased risk of thromboembolic disease in users of sequential products. This risk cannot be quantitated, and further studies to confirm this finding are desirable.

Discontinue medication pending examination if there is sudden partial or complete loss of vision, or if there is a sudden onset of proptosis, diplopia or migraine. If examination reveals papilledema or retinal vascular lesions medication should be withdrawn.

Since the safety of Demulen in pregnancy has not been demonstrated, it is recommended that for any patient who has missed two consecutive periods pregnancy should be ruled out before continuing the contraceptive regimen. If the patient has not adhered to the prescribed schedule the possibility of pregnancy should be considered at the time of the first missed period.

A small fraction of the hormonal agents in oral contraceptives has been identified in the milk of mothers receiving these drugs. The long-range effect to the nursing infant cannot be determined at this time.

Precautions — The pretreatment and periodic physical examinations should include special reference to the breasts and pelvic organs, including a Papanicolaou smear, since estrogens have been known to produce tumors, some of them malignant, in five species of subprimate animals. Endocrine and possibly liver function tests may be affected by treatment with Demulen. Therefore, if such tests are abnormal in a patient taking Demulen, it is recommended that they be repeated after the drug has been withdrawn for two months. Under the influence of progestogen-estrogen preparations preexisting uterine fibromyomas may increase in size. Because these agents may cause some degree of fluid retention, conditions which might be influenced by this factor, such as epilepsy, migraine, asthma, cardiac or renal dysfunction, require careful observation. In breakthrough bleeding, and in all cases of irregular bleeding per vaginam, nonfunctional causes should be borne in mind. In undiagnosed bleeding per vaginam adequate diagnostic measures are indicated. Patients with a history of psychic depression should be carefully observed and the drug discontinued if the depression recurs to a serious degree. Any possible influence of prolonged Demulen therapy on pituitary, ovarian, adrenal, hepatic or uterine function awaits further study. A decrease in glucose tolerance has been observed in a significant percentage of patients on oral contraceptives. The mechanism of this decrease is obscure. For this reason, diabetic patients should be carefully observed while receiving Demulen therapy. The age of the patient constitutes no absolute limiting factor, although treatment with Demulen may mask the onset of the climacteric. The pathologist should be advised of Demulen therapy when relevant specimens are submitted. Susceptible women may experience an increase in blood pressure following administration of contraceptive steroids.

Adverse reactions observed in patients receiving oral contraceptives — A statistically significant association has been demonstrated between use of oral contraceptives and the following serious adverse reactions: thrombophlebitis, pulmonary embolism and cerebral thrombosis.

Although available evidence is suggestive of an association, such a relationship has been neither confirmed nor refuted for the following serious adverse reactions: neuro-ocular lesions, e.g., retinal thrombosis and optic neuritis.

The following adverse reactions are known to occur in patients receiving oral contraceptives: nausea, vomiting, gastrointestinal symptoms (such as abdominal cramps and bloating), breakthrough bleeding, spotting, change in menstrual flow, amenorrhea during and after treatment, edema, chloasma or melasma, breast changes (tenderness, enlargement and secretion), change in weight (increase or decrease), changes in cervical erosion and cervical secretions, suppression of lactation when given immediately post partum, cholestatic jaundice, migraine, rash (allergic), rise in blood pressure in susceptible individuals and mental depression.

Although the following adverse reactions have been reported in users of oral contraceptives, an association has been neither confirmed nor refuted; anovulation post treatment, premenstrual-like syndrome, changes in libido, changes in appetite, cystitis-like syndrome, headache, nervousness, dizziness, fatigue, backache, hirsutism, loss of scalp hair, erythema multiforme, erythema nodosum, hemorrhagic eruption and itching.

The following laboratory results may be altered by the use of oral contraceptives: hepatic function: increased sulfobromophthalein retention and other tests; coagulation tests: increase in prothrombin, Factors VII, VIII, IX and X; thyroid function: increase in PBI and butanol extractable protein bound iodine, and decrease in T^3 uptake values; metyrapone test and pregnanediol determination.

References: 1. Royal College of General Practitioners: Oral Contraception and Thrombo-Embolic Disease, J. Coll. Gen. Pract. *13*:267-279 (May) 1967. **2.** Inman, W. H. W., and Vessey, M. P.: Investigation of Deaths from Pulmonary, Coronary, and Cerebral Thrombosis and Embolism in Women of Child-Bearing Age, Brit. Med. J. 2:193-199 (April 27) 1968. **3.** Vessey, M. P., and Doll, R.: Investigation of Relation Between Use of Oral Contraceptives and Thromboembolic Disease. A Further Report, Brit. Med. J. 2:651-657 (June 14) 1969. **4.** Sartwell, P. E.; Masi, A. T.; Arthes, F. G.; Greene, G. R., and Smith, H. E.: Thromboembolism and Oral Contraceptives: An Epidemiologic Case-Control Study, Amer. J. Epidem. 90:365-380 (Nov.) 1969.

1A2

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Orient Vacation Tour Sponsored By OSMA

OSMA JOURNAL/news

Kansas and Oklahoma will join together to promote a two-week tour of the Orient for physicians. Oklahoma's participation was assured when the OSMA Board of Trustees voted to endorse the program.

This tour will be a two-week trip, one-week in Tokyo and one-week in Hong Kong. Price of the trip package is $898 plus $35 tax and services. Regular round trip economy air fare from Oklahoma City to Hong Kong would be in excess of $1,000 alone.

This special Orient adventure price includes chartered round trip jet transportation via World Airways 707 jet, deluxe hotels, two meals daily (an American breakfast in the hotel and gourmet dinners at a choice of the finest restaurants in each city), tips, transfers and many other extras to make the trip more enjoyable. The baggage allowance has been increased to 100 pounds, more than adequate allowance for Hong Kong shopping and golf clubs.

The 707 jet features stretch out, extra comfort seating, along with the finest food, champagne and complimentary cocktails.

There is absolutely no regimentation on the Orient Adventure. Vacationers are free to go where they want, do what they want, when they feel like doing it! A special Orient Adventure escort will travel with the group throughout the trip. In Japan and Hong Kong five personable hosts will assist in arranging sight-seeing, shopping, golfing, night clubbing, and other activities. An added extra of the tour will be educational seminars presented by oriental physicians.

The tour is being organized by the International Travel Advisers, Inc., known as Intrav, from their main office in St. Louis.

During the Tokyo stay, accommodations will be in the New Otani Hotel. It is described as "practically a city in itself" and is a fully air conditioned completely modern hotel. Facilities include ten restaurants serving Japanese, Chinese, Continental and American dishes. Entertainment is furnished nightly in two restaurants and two bars. The world's largest cocktail lounge, the Blue Sky Lounge on the 17th floor, has a panoramic view of all of Tokyo.

An optional side trip to Kyoto on the famous 130 mile per hour bullet train will take the vacationers to the Capitol of feudal Japan. Kyoto is still the artistic and cultural center of the country. In this beautiful city there are hundreds of gracious traditional Japanese gardens and over 2,000 Buddhist temples and Shinto shrines.

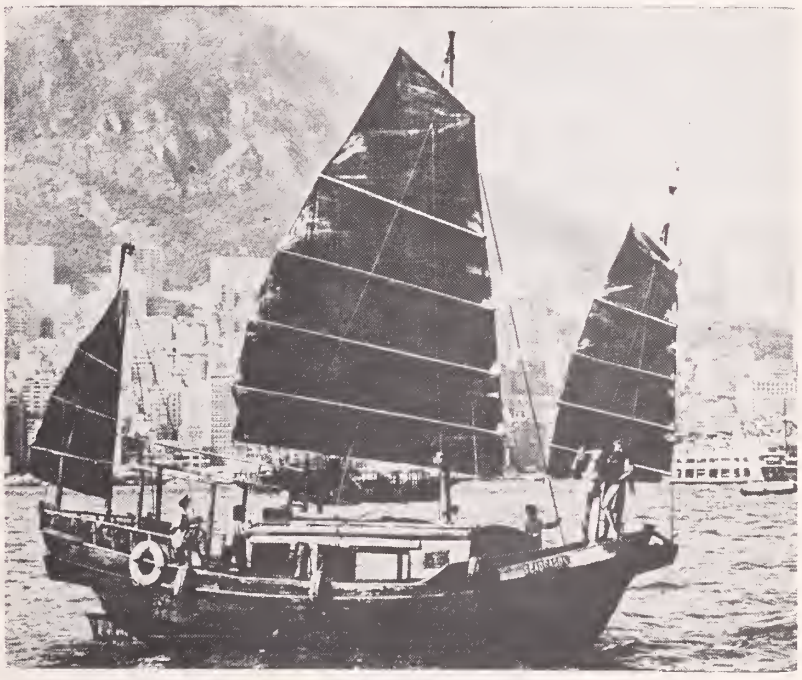
In Hong Kong, "pearl of the Orient," accommodations will be in the hotel which Fortune magazine describes as "one of the ten greatest hotels in the world." The Mandarin Hotel was the only modern hotel so named. It features 24-hour room service and has seven restaurants and bars. The Harbor Room Supper Club situated on the top floor commands a magnificent view of the harbor and city. Other restaurants include the elegant Chinese Man Wah Room and the Mandarin Grill, a delightful grill room on the first floor.

Hong Kong is a mixture of British tradition and the intrigue of the far east. This British Crown colony is actually two cities, Victoria on the island of Hong Kong and Kowloon, on the mainland peninsula. The two are separated by the world's most spectacular harbor. The ferry ride across this bustling waterway offers close-up views of sampans, junks, freighters and luxury liners.

An optional three-day excursion to Bangkok is also offered. In this "land of smiles" the splendor of the grand palace blends with the glittering temple of the Dawn and the awesome beauty of the golden Buddha. This excursion is available to members at a special reduced Orient Adventure price.

Intrav refers to their Orient Adventure as a "non-tour tour," because there is no regimentation—tour members do as they please.

The tour will leave from Oklahoma City on October 17th of this year. Physicians interested should contact the OSMA executive office in Oklahoma City. □



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Capp To Keynote 65th Annual Meeting

Al Capp, world famous creator of L'il Abner, will be one of the highlights of the 65th annual meeting of the Oklahoma State Medical Association. Scheduled for Tulsa's Assembly Center and the Fairmont-Mayo Hotel, April 29th-May 1st, the meeting will feature educational scientific sessions, entertainment functions, and over 50 exhibits.

Capp's presentation, "Ask Al Capp," will be held Saturday afternoon on the stage of the Assembly Center. He works in an informal style, reading and answering questions from a stack of cards submitted by the audience. Attendance to his talk will be limited to those persons registered for the meeting and the members of the women's auxiliary.

Other entertainment functions during the three-day meeting will include the traditional stage door picnic luncheons at noon on Friday and Saturday. Friday evening a wine tasting party is scheduled. This will be followed by a number of medical specialty groups having separate dinner meetings.

Social highlight of the meeting is the annual President's Inaugural Dinner-Dance held Saturday evening. It will be preceded by a large cocktail party and special entertainment will be furnished by the Oral Roberts University World Action Singers.

Business portion of the annual meeting will start early Thursday morning with a meeting of the OSMA Board of Trustees. Thursday evening at 7:00 p.m. the House of Delegates will convene for its opening session. Friday morning is reserved for reference committee meetings to discuss and debate the various issues and resolutions brought to the House of Delegates. Closing session of the House of Delegates will be held Saturday morning. At that time the various resolutions will be voted on and new officers will be elected for the association. At that time Lucien M. Pascucci, M.D., of Tulsa, will officially become the President of the OSMA for the 1971-72 year.

Over 50 scientific and commercial exhibits will be on display in the the auditorium of the Tulsa Assembly Center. All will be designed specifically for physician interest.

Following is the schedule of events:

THURSDAY

9:00 a.m. Board of Trustees

2:00 p.m. **Subject: "Lumps in the Neck — Including Thyroid Diseases."**
Speaker: John Gaisford, M.D., Pittsburgh, Pennsylvania
Panel: Surgery
Internal Medicine
Radiology

7:00 p.m. House of Delegates

FRIDAY

9:00 a.m. **Subject: "Gastroenterology with Special Emphasis on Changing Concepts of Hepatitis."**
Speaker: Leslie J. Schonfield, M.D., Los Angeles, California.
Panel: Surgery
Internal Medicine
Pediatrics

9:00 a.m. Reference Committee Meetings

11:00 a.m. **Subject: "Wounds and Illnesses that May Have Changed the Course of the Civil War."**
Speaker: R. Maurice Hood, M.D., Austin, Texas.

12:00 p.m. Picnic Luncheon

2:00 p.m. **Subject:** Diabetes Symposium
Speaker: Marvin Levin, M.D., St. Louis, Missouri.
Panel: Internal Medicine
Pediatrics
General Practice

6:00 p.m. Wine Tasting Party

SATURDAY

9:00 a.m. **Subject:** Dermatology Symposium
Speaker: Mage Hunneycutt, M.D., Little Rock, Arkansas.

9:00 a.m. House of Delegates

9:00 a.m. **Subject: "The Newer Antibiotics: Their Therapeutic Indications and Effectiveness."**
Speaker: Francis J. Carey, M.D., St. Louis, Missouri.

9:30 a.m. **Subject: "Acute Arterial Injury."**
Moderator: Lazar J. Greenfield, M.D., Oklahoma City, Oklahoma.
Panel: Kemper Lain, M.D., Oklahoma City
G. Rainey Williams, M.D., Oklahoma City
Albert Shirkey, M.D., Tulsa, Oklahoma

10:30 a.m. **Subject: "Allied Health Personnel."**
Speaker: Frank A. Riddick, Jr., M.D., New Orleans, Louisiana.

11:15 a.m. **Subject: "The Physician Assistant Program in Oklahoma."**
Speakers: Thimas N. Lynn, M.D., Oklahoma City; Mr. William Stanhope, Oklahoma City.

12:00 p.m. Picnic Luncheon

1:00 p.m. **Subject: "Experience of Canadian Physicians with Government Controlled Medicine."**
Speaker: Eugene F. Balangero, M.D., Montreal, Canada.

2:30 p.m. **Subject: "Ask Al Capp"**
Speaker: Al Capp

6:00 p.m. Cocktail Party

7:00 p.m. Inaugural Dinner-Dance
(Entertainment — World Action Singers) □

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Thomas Named To Top Medicare Advisory Post



HARLAN THOMAS, M.D.

Harlan Thomas, M.D., Tulsa, has been appointed to a four-year term as a regional representative to the influential Health Education Benefits Advisory Council, known as HIBAC. The appointment was announced by Robert M. Ball, Commissioner of Social Security.

HIBAC, along with various other consultive groups, was established by the original Medicare law and plays an important consultive role on Medicare policies and procedures. It consists of nineteen persons who are "outstanding in fields related to hospital, medical, and other health activities, persons who are representative of organizations and associations of professional personnel in the field of medicine, and at least one person who is representative of the general public." Each member holds office for four years and can serve no more than two terms.

In its advisory capacity, the council has advised the Secretary of HEW with respect to every major policy and procedure affecting program implementation. In 1967 its function was expanded to "study the utilization of hospital and other medical care and services for which payment may be made under this title (Medicare) with a view to recommending any changes which may seem desirable in the way in which such care and services are utilized or in the administration of the programs established. . . ."

Doctor Thomas attended his first meeting of the council on February 26th-27th in Baltimore. He was named to the council to fill the position vacated by Carrol L. Witten, M.D., past-president of the American Academy of General Practice, from Louisville, Kentucky.

Doctor Thomas is one of eight M.D.s on the council. He has been a general practitioner and long active in organized medicine in Oklahoma. In 1964-65 he was President of the OSMA and has served as Chairman of many association councils and committees. He is presently one of the state association's three delegates to the AMA, and also serves on the Board of Directors and as Chairman of the Legislative Committee of the American Academy of General Practice.

HIBAC meets at the call of the Secretary of HEW or upon request of five or more of its own members. □

OSMA Offers New Life Insurance Program

A new and improved program of group term life insurance for OSMA members is now available. Endorsed by the OSMA's Council on Insurance, the new policy is underwritten by the Massachusetts Mutual Life Insurance Company.

A maximum life insurance benefit of $50,000 will be available up to age 60 at rates based upon age categories. In addition, large amounts of accidental death benefits are included. Prior to age 60, the plan will pay a total of $150,000 for accidental death and $250,000 if death occurs on a common carrier.

For flying physicians, the new plan offers full aviation coverage, regardless of the number of total hours flown by the pilot.

The association's old program, also underwritten by Massachusetts Mutual Life Insurance Company, had a stable premium with an annually decreasing amount of term life insurance. The new program offers a stable benefit and an increasing premium. All OSMA members insured under the old policy have the opportunity of electing to participate in the new program by submitting evidence of insurability. However, the old policy may be continued without any increase in cost or reduction of benefits.

Walter Wilson, Insurance Counsel for the OSMA, worked with the association to create the new program. The result was a program which offers enlarged benefits at greatly reduced rates per $1,000 of coverage.

Premium rates for the new policy are as follows: For physicians age 30 and under, the annual premium will be $100; 30 through 39 will have an annual premium of $200; 40 through 49, $400; 50 through 54, $700; 55 through 59, $1,000.

At age 60, the basic amount of life insurance drops from $50,000 to $25,000 with a corresponding drop in accidental death benefits to $75,000 and death on a common carrier to $125,000. Premium for this age group is $800 annually.

Another decrease in benefits takes place at age 65 through 69. The amount of basic life insurance drops to $10,000, accidental death benefit drops to $30,000, and death on a common carrier to $50,000. Annual premium for this age category is $500.

Interested physicians may contact the OSMA executive office or Walter C. Wilson, C.L.U, Administrator, 1470 First National Bank Building, Oklahoma City 73102. □

Resolutions Received By *The Journal*

Tributes acknowledging the loss by the medical profession and the faculty of the University of Oklahoma School of Medicine by the deaths of four of its members have been received by *The Journal* from the Office of the Dean of the OU Medical Center.

Copies of the resolutions honoring Paul Kimmelstiel, M.D., Howard B. Shorbe, M.D., John P. Colmore, M.D., and Henry H. Turner, M.D., have been sent to their relatives with sympathy and a desire to share their mutual loss. □

Carpenter Named Health Department Head

R. Leroy Carpenter, M.D., has been named State Commissioner of Health. Doctor Carpenter's appointment was announced by the members of the State Board of Health.

Carpenter has served as Chief of Personnel Health Services for the State Health Department since 1968. He has also worked in epidemiology, venereal diseases, tuberculosis control, chronic disease control, emergency medical services, immunization and dental services.

Shortly after being appointed Carpenter outlined a four-point program of environmental quality control, family planning and genetic counseling, consumer protection and improved medical services for rural communities.

In developing health services in specific areas, Carpenter said this effort would include the Oklahoma State Medical Association and the University of Oklahoma Medical School. "I would like to praise the work those two groups have already done in rural medical counseling, and hope we can join forces in that area," he said.



R. LEROY CARPENTER, M.D.

Referring to consumer protection, Carpenter mentioned "hundreds of injuries and some deaths" each year in Oklahoma due to unsafe toys sold to parents who do not realize the danger to their children. He said he would strive to eliminate this hazard.

The doctor is a 1956 graduate from the University of Kansas Medical School. He served a rotating internship at Bethany Hospital, Kansas City and followed with a residency at the University of Oklahoma Medical Center. The doctor is presently working on his masters of Public Health (MPH) at the University of Oklahoma School of Health. This degree will be conferred in August of this year.

After his appointment Doctor Carpenter named two men to serve as Deputy Commissioners in the State Health Department. They are Lloyd F. Pummill who presently serves as Chief of Environmental Health Services and Ted Herbelin, M.D., who recently came to work as Special Assistant to the Acting State Health Commissioner, John W. Shackelford, M.D. □

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Sites Named For Two Drug Seminars

Quartz Mountain Lodge on Lake Altus, Lugert, will be the site of the fourth OSMA Drug Abuse Seminar for physicians. Scheduled for Thursday evening, April 8th, the seminar is one of six being held by the association's Alcoholism and Drug Abuse Committee to familiarize physicians with the short term diagnosis and treatment of drug intoxicated patients.

Fifth seminar in the series will be held on Thursday evening, May 13th at Lake Texhoma Lodge on Lake Texhoma. Both meetings will start at 6:30 p.m. and dinner will be served.

Following dinner, Doctor Jim Earls, M.D., Associate Professor of Psychiatry at the OU Medical Center will talk on "Acute Symptoms and Management of Drug Users." This will be followed by a presentation from Tom Donica, M.D., on advising and counseling parents and family members of a drug abusing patient. Donica is also associate professor of psychiatry at OU.

A panel discussion will close the meeting. Faculty for the panel will include Doctors Earls and Donica and Al Paredes, M.D., Professor of Research Psychiatry at OU. Frank Adelman, M.D., Enid psychiatrist, chairman of the special subcommittee that organized and planned the entire program will act as program moderator.

Two and one-half hours of credit from the American Academy of General Practice is given for seminar attendance.

Registration fee for each of the seminars will be $10 per person, to cover cost of the meal and program expense.

Physician's wives and office personnel are invited to attend each seminar, but must pay the $10 registration fee.

Recently the OSMA distributed a *Drug Abuse Treatment Manual.* The manual was compiled for use in conjunction with the drug abuse seminars and all physicians are urged to retain their copy for future reference. □

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DEATHS

MAXWELL A. JOHNSON, M.D.

1914-1971

Former OSMA President, Maxwell A. Johnson, M.D., died in Tulsa, February 23rd, 1971. A native of Chicago, Doctor Johnson received his medical degree from the University of Chicago School of Medicine in 1943. He served with the Navy in both World War II and the Korean Conflict.

The Tulsa urologist had practiced there since 1948. In 1965 he assumed duties as president of the Tulsa County Medical Society. He served as President of the OSMA in 1967-68. He had also been President of the Oklahoma Urology Association.

Certified by the American Board of Urology, Doctor Johnosn was a member of the Southwest Congress of Surgeons, the Alpha Omega Alpha and the Phi Beta Pi as well as other medical and urological groups. He had been an advisor to the University of Oklahoma Medical School.

ROBERT E. NATHAN, M.D.

1911-1971

Tulsa internist, Robert E. Nathan, M.D., died February 2nd, 1971 in Tulsa. Born in Frankfort, Germany, Doctor Nathan graduated from the University of Florence School of Medicine in 1936. He came to New York in 1938. Following practice in Houston, Texas, where he was an Instructor in Internal Medicine at Baylor College School of Medicine, Doctor Nathan moved to Tulsa where he was practicing at the time of his death. □

Miscellaneous Advertisements

GENERAL SURGEON SEEKS practice opportunity in Oklahoma. Licensed in Pennsylvania and New York, eligible in Oklahoma. Eligible, American Board of Surgery. Desires location with emphasis on surgery, but will do limited general practice. Contact Key S, The Journal, Oklahoma State Medical Association, 601 N.W. Expressway, Oklahoma City, Oklahoma 73118.

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SENIOR GENERAL SURGICAL RESIDENT with family seeking a locums tenens position for all or part of July, 1971, in general practice or general surgical practice. Experienced in practice coverage and emergency room medicine. Reply to Key F., The Journal, Oklahoma State Medical Association, 601 N.W. Expressway, Oklahoma City, Oklahoma 73118.

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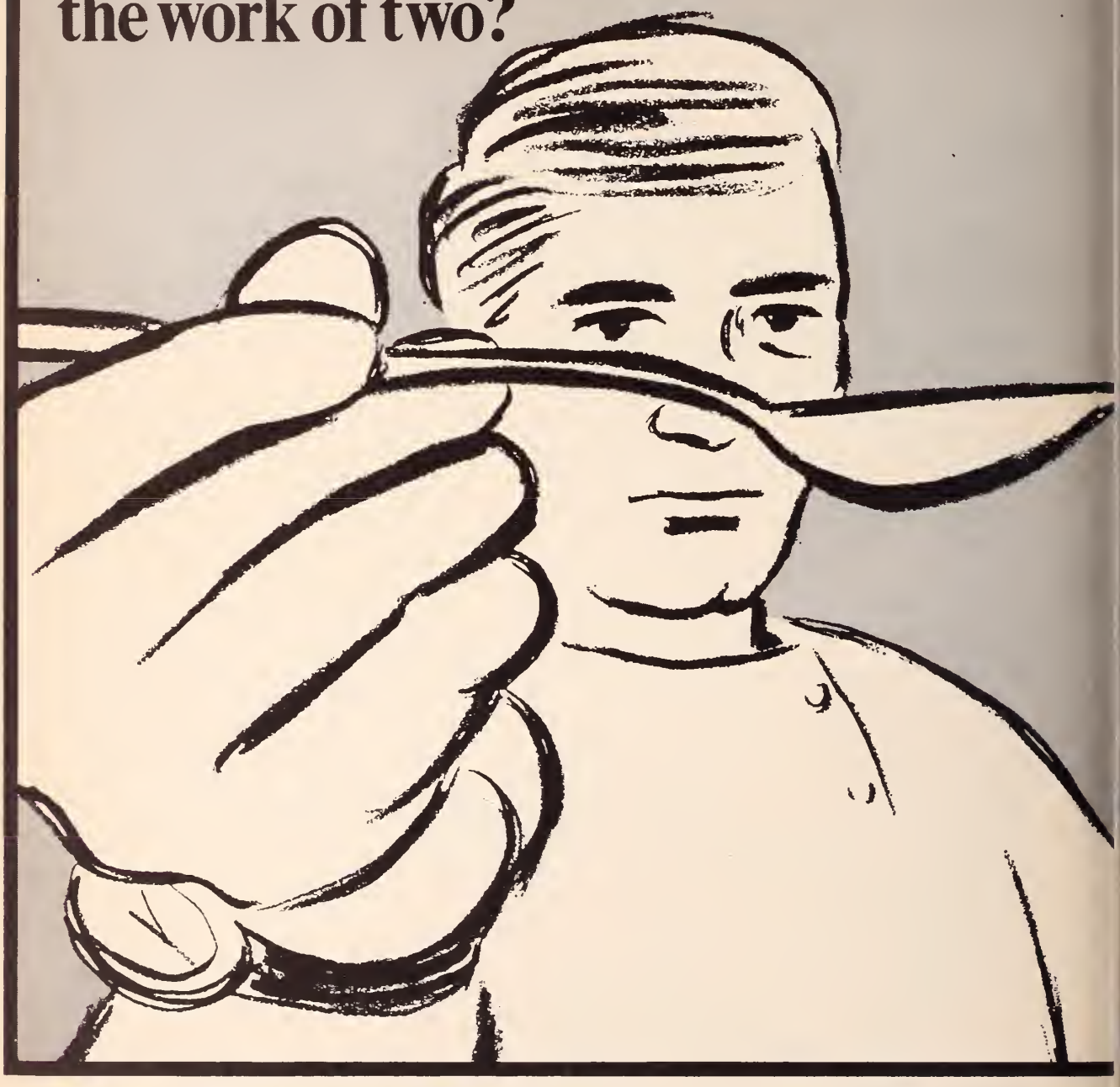
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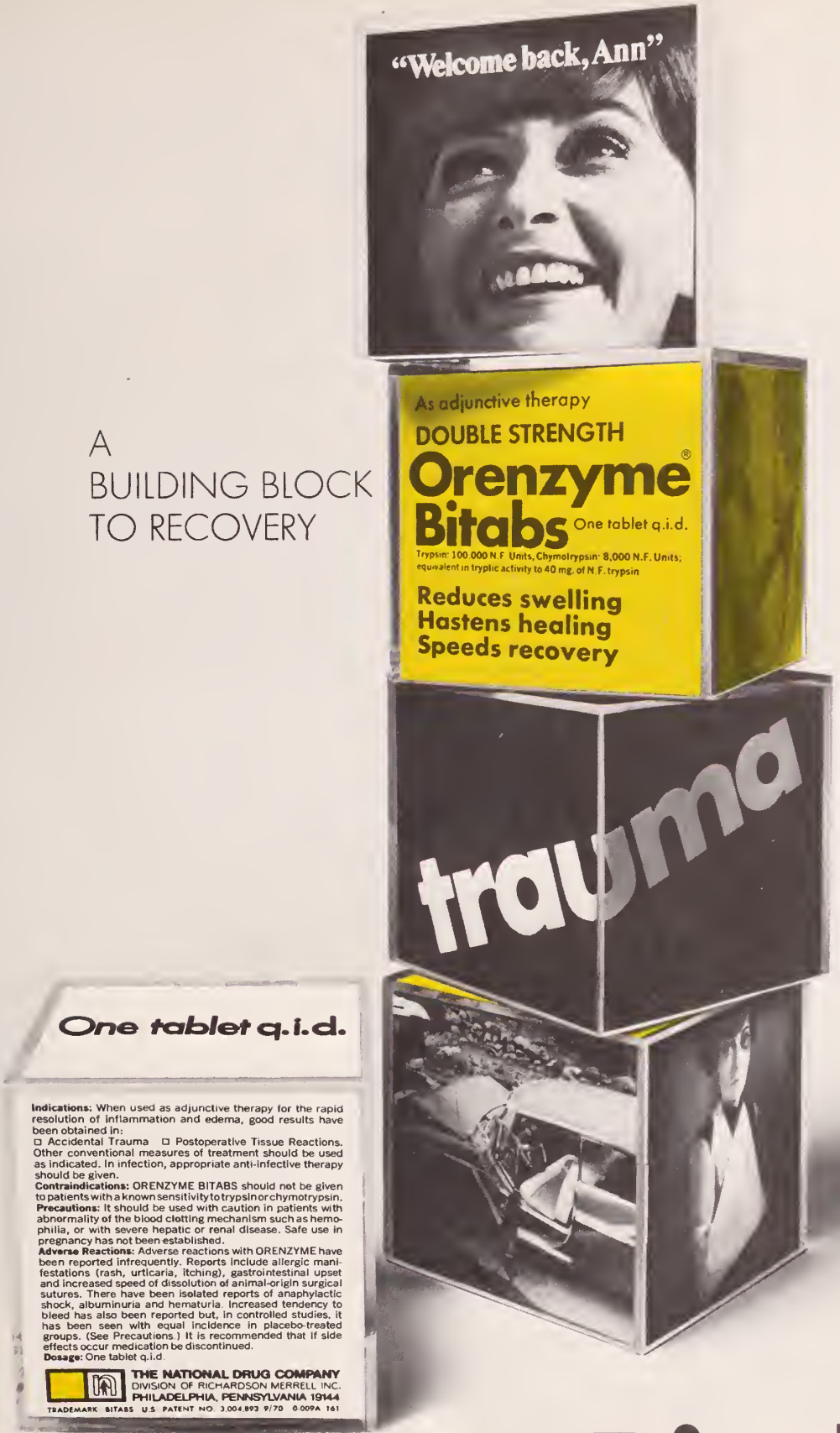
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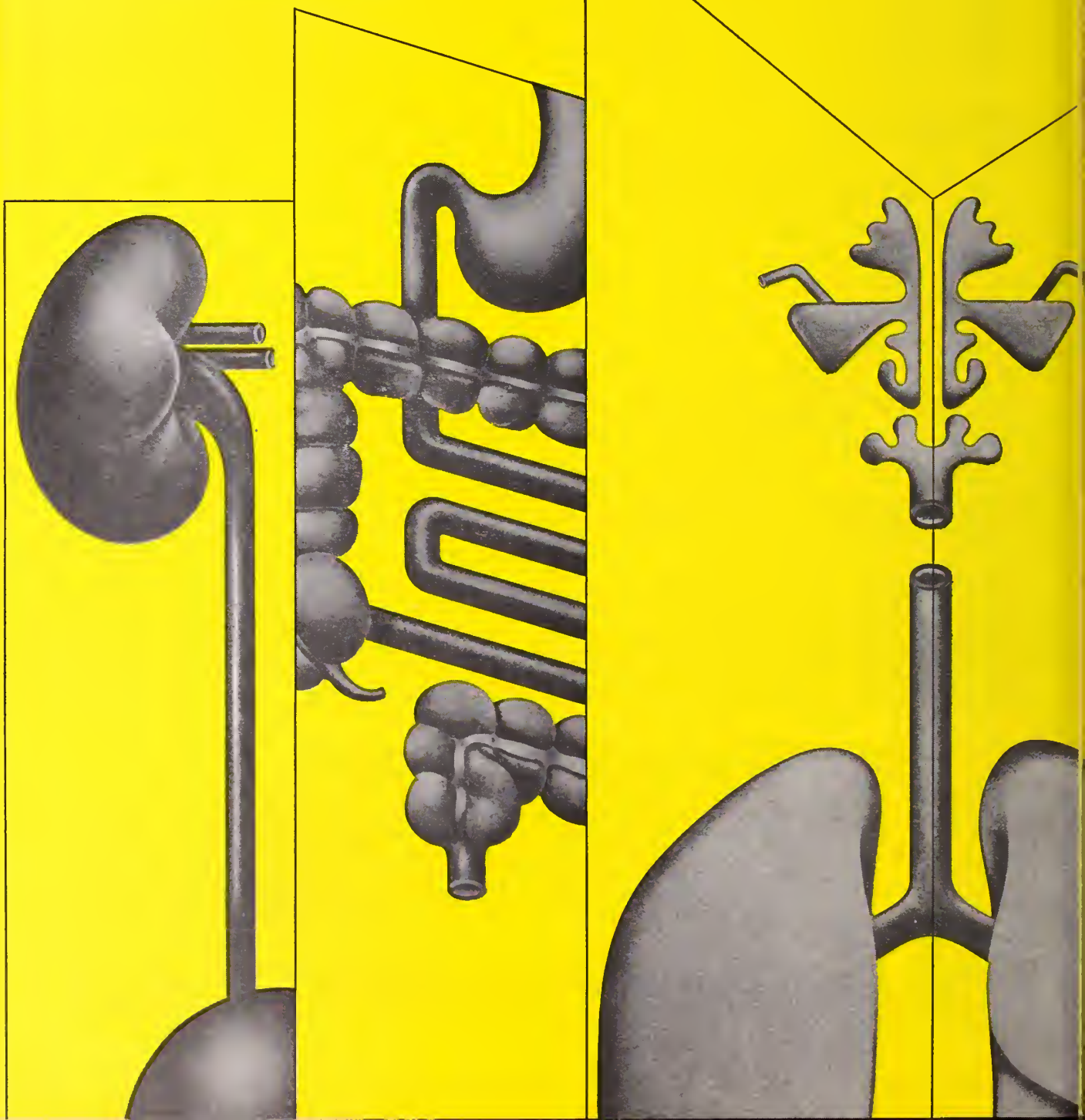
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DRUG ABUSE

TREATMENT SEMINAR

Four seminars on the diagnosis and treatment of the drug intoxicated patient have been scheduled by the OSMA Drug Abuse Committee.

The seminars are located throughout the state so that as many physicians as possible may be able to attend. Each is an evening meeting with dinner being served and followed by the scientific program. A registration fee of $10 per person covers the cost of the meal and meeting expenses.

All physicians should plan to attend the seminar in their area.

April 8th—Altus *

May 13th—Lake Texhoma Area*

June 10th—Oklahoma City *

*Exact location of seminar will be announced later.

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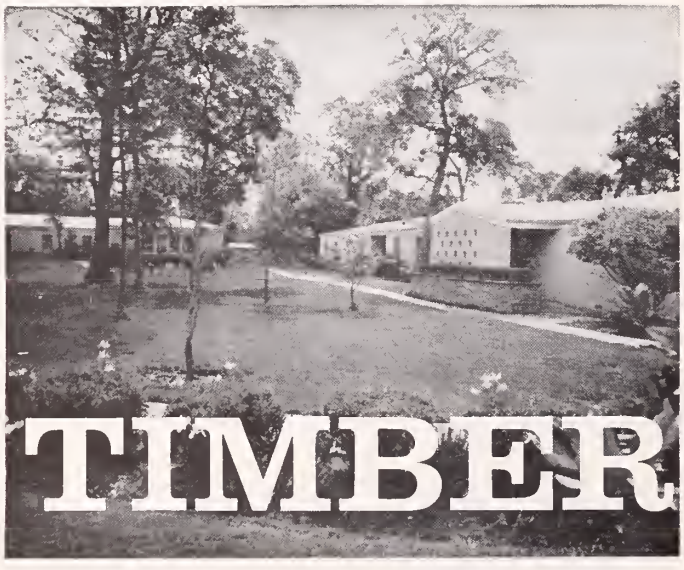
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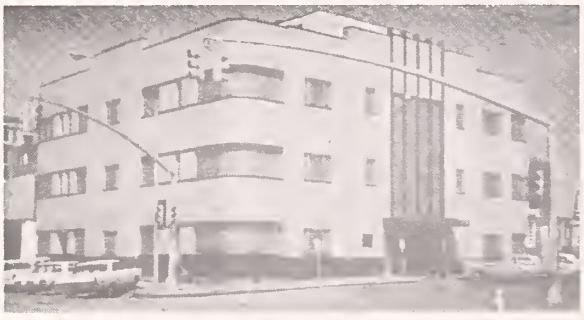
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The JOURNAL *of the Oklahoma State Medical Association*

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July Issue

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Advertising Copy	June 15, 1971
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NEWS

Members of the Oklahoma State Medical Association, the constituent societies of the association, and all readers in general are invited to supply news items of general interest to the profession.

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BACK ISSUES

Microfilm copies of back issues of *The Journal* may now be purchased from University Microfilms, 300 North Zeeb Road, Ann Arbor, Michigan 48106.

President Nixon's health message to Congress had two dominant features: Proposal for a National Health Insurance Standards Act and a final blueprint for the President's previously announced Family Health Insurance Plan. The NHISA proposal requires employers to finance the bulk of costs for minimum health insurance protection of their employees, effective July 1st, 1973. Standard coverage would include in-patient hospital care or the equivalent benefits in extended care facilities or home health services. Also surgical and medical care, including physician's services, laboratory and X-ray services, maternity care, well-child care and children's eye care. Deductibles would be $100 per person, plus two days of hospital room charges. FHIP would protect low income families not covered by the employer plan. Premium costs of a family of four having taxable income of $3,000 or less would be picked up by the government. Families having taxable incomes of $3,000 to $5,000 would pay a portion of the premium costs. FHIP would scrap Medicaid except for the aged, blind and disabled.

Health Maintenance Organizations came in for a strong push in the President's message. Public and private health insurance plans would be required to permit members to choose HMO memberships wherever available. HMO options should also be provided under Medicare and FHIP, the President said. To spur establishment of HMOs, described as "an expensive and complicated task," the President proposed a $23 million planning program. To encourage development of HMOs in rural areas and inner-cities, $22 million in direct grants and loans was proposed. Assistant HEW Secretary Lewis H. Butler said that the administration's goal was to establish 100 new HMOs in 1972 and an additional 100 in the next few years. He said 30 now exist and, "our aim is to have 90 percent of the population enrolled in HMOs by 1980."

Draftable doctors may have to start worrying again. The two-year reprieve of the "doctor draft" may soon be ended. The Department of Defense is now weighing a decision on whether to issue induction calls to the pool of approximately 9,000 draft-eligible interns and residents. The Assistant Secretary of Defense for Health and Environment has reportedly submitted a request for induction of at least 1,250 physicians. Under selective service policy, physicians are not inducted until they have completed internship. First to be drafted—if the order is signed—would be those 26 years old. Last to be called would be the 35 year olds.

Chiropractors came in for knocks in February. Eighteen prominent physicians and others interested in health care have joined in a letter written by Alton Ochsner, M.D., New Orleans, to state their "sincere hope that the Congress will accept the overwhelming evidence now available that chiropractic should not be included in any health care program for the people, such as Medicare Medicaid," and that "chiropractic must not be included in any national health insurance program under consideration." The letter was sent to the Chairman of the Senate Finance Committee and the House Ways and Means Committee with copies to all members of Congress.

A tax incentive proposal aimed at encouraging physicians to practice in designated "physician shortage" areas has been introduced by Senator John Tower (R-Texas). The bill provides that the first $20,000 of adjusted gross income from practice would be tax exempt during the first year of participation. Decreasing exemptions would be authorized for an additional four years. To be eligible for the tax incentives, physicians would be required to practice for a minimum of two years in any physician shortage area of his choice.

AMA's Medicredit bill has been reintroduced in the Congress. Several changes have been made from last year's version. Previously, Medicredit proposed that a family with a federal income tax liability of $300 or less would get a 100 percent subsidy. The new bill will propose a total subsidy for only families whose incomes are so low, or whose deductions are so high, that they owe no federal income taxes. □

The hypochondriac fugitive from anxiety

For many patients with hypochondriacal tendencies, physical complaints represent a device by which they can avoid facing emotionally charged personal problems. When anxiety is pronounced, the calming action of Librium (chlordiazepoxide HCl), by relieving anxiety, may foster communication, favor productive counseling and accelerate relief of anxiety-linked symptoms.

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Precautions: In the elderly ond debilitoted, and in children aver six, limit to smallest effective dasage (initially 10 mg or less per day) ta preclude otaxio or aversedation, increasing gradually os needed and tolerated. Nat recommended in children under six. Thaugh generolly nat recammended, if combination therapy with ather psychatrapics seems indicated, carefully consider individual phormacalogic effects, particularly in use of potentioting drugs such os MAO inhibitors ond phenothiozines. Observe usual precautions in presence af impoired renol or hepotic functian. Parodaxicol reactions (e.g., excitement, stimulation and acute rage) hove been reported in psychiotric potients ond hyperactive oggressive children. Emplay usual precautians in treotment af anxiety states with evidence of impending depressian; suicidal tendencies may be present and protective meosures necessary. Variable effects on blaod caagulatian have been reported very rarely in patients receiving the drug and orol onticoagulonts; causol relotionship hos not been estoblished clinicolly.

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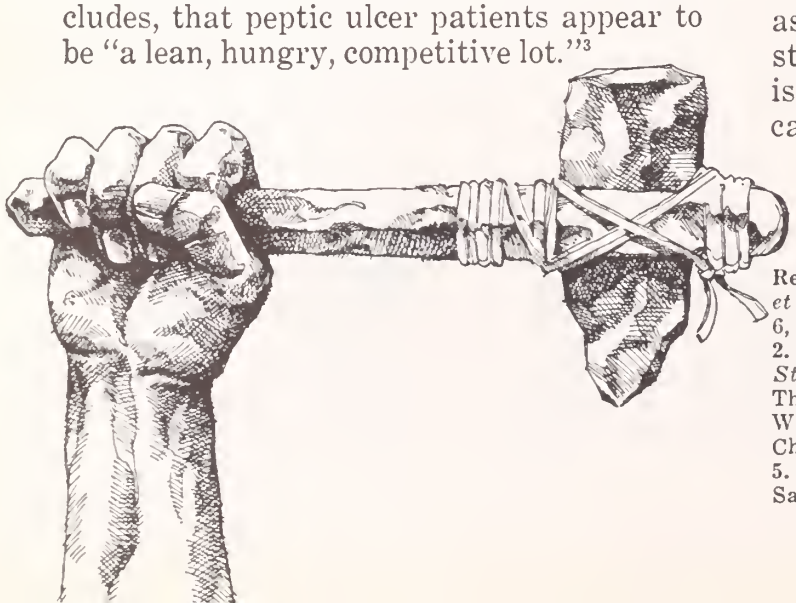
IF MORE MEN CRIED



At least seventy-five out of one hundred adults with duodenal ulcers are men.[1] Why? It may be significant that duodenal ulcer patients tend to crave recognition and are "especially vulnerable to threats to their manly assertive independence."[2]

Hypersecretion—an atavistic response. Stewart Wolf, who, with Harold G. Wolff, studied the personalities of duodenal ulcer patients, wonders if masculine competitiveness is related to "an atavistic urge to devour an adversary." It is striking, he reports, that an accentuation of gastric acid secretion and motility can be "induced in ulcer patients by discussions that arouse feelings of inadequacy, frustration and resentment."[2]

By chance? A lean, hungry lot. Was the link between emotions and gastric hyperacidity acquired through mutation to serve a purpose? During man's jungle period of evolution, the investigator points out, a male dealt with a foe by killing and devouring it. "It may be more than coincidence," he concludes, that peptic ulcer patients appear to be "a lean, hungry, competitive lot."[3]



Big boys don't cry. If more men cried maybe fewer would wind up with duodenal ulcers. But men will be men—the sum total of their genes and what they are taught. Schottstaedt observes that when a mother admonishes her son who has hurt himself that big boys don't cry, she is teaching him stoicism.[4] Crying is the negation of everything society thinks of as manly. A boy starts defending his manhood at an early age

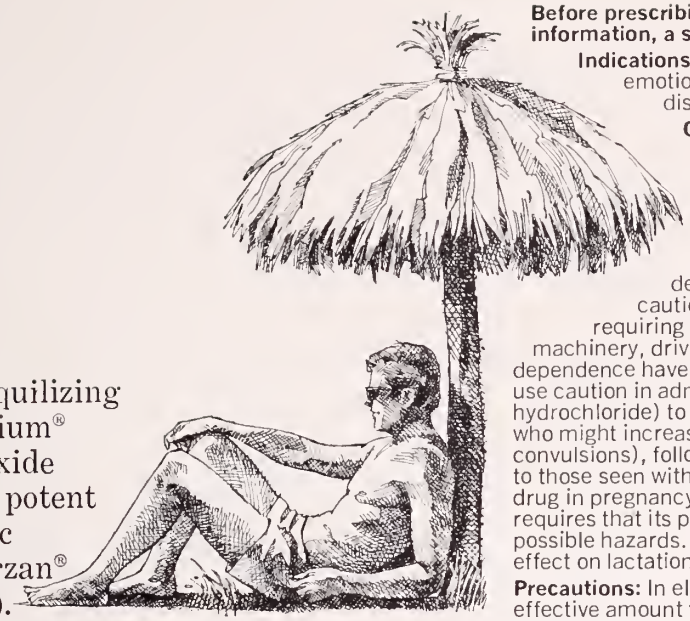


Take away stress you can take away symptoms

There is no question that stress plays a role in the etiology of duodenal ulcer. Alvarez[5] observes that many a man with a ulcer loses his symptoms the day he shuts up the office and starts out on a vacation. The problem is, the type of man likely to have a ulcer is the type least likely to take long vacations or take it easy at work.

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References: 1. Silen, W.: "Peptic Ulcer," in Wintrobe, M. M. *et al.* (eds.): *Harrison's Principles of Internal Medicine*, e 6, New York, McGraw-Hill Book Company, 1970, p. 144 2. Wolf, S., and Goodell, H. (eds.): *Harold G. Wolff Stress and Disease*, ed. 2, Springfield, Ill., Charles Thomas, 1968, pp. 68-69. 3. *Ibid.*, p. 257. 4. Schottstaed W. W.: *Psychophysiologic Approach in Medical Practic* Chicago, Ill., The Year Book Publishers, Inc., 1960, p. 16 5. Alvarez, W. C.: *The Neuroses*, Philadelphia, Pa., W. B Saunders Company, 1951, p. 384.



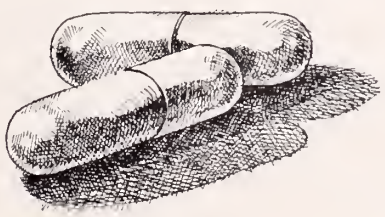
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Precautions: In elderly and debilitated, limit dosage to smallest effective amount to preclude development of ataxia, oversedation or confusion (not more than two capsules per day initially; increase gradually as needed and tolerated). Though generally not recommended, if combination therapy with other psychotropics seems indicated, carefully consider individual pharmacologic effects, particularly in use of potentiating drugs such as MAO inhibitors and phenothiazines. Observe usual precautions in presence of impaired renal or hepatic function. Paradoxical reactions (*e.g.*, excitement, stimulation and acute rage) have been reported in psychiatric patients. Employ usual precautions in treatment of anxiety states with evidence of impending depression; suicidal tendencies may be present and protective measures necessary. Variable effects on blood coagulation have been reported very rarely in patients receiving the drug and oral anticoagulants; causal relationship has not been established clinically.

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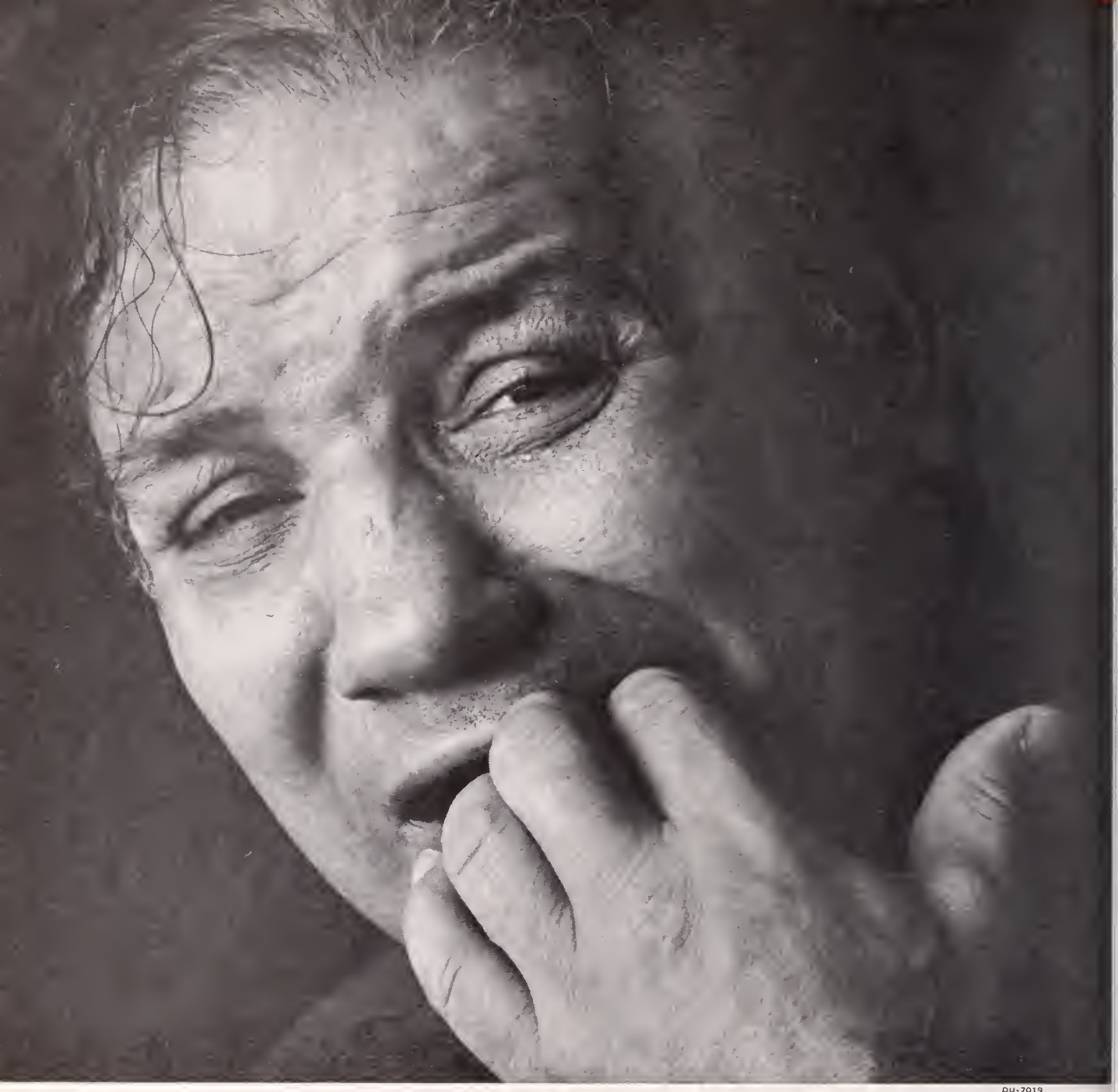
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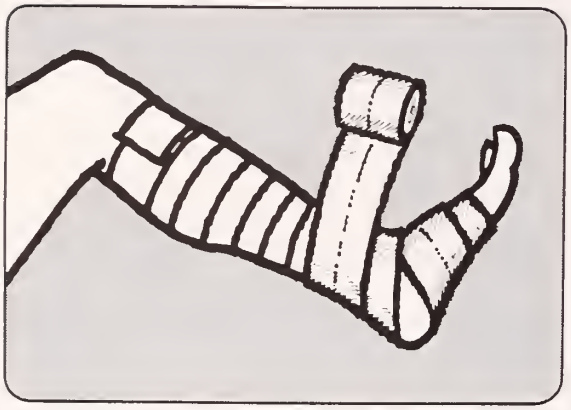
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Warnings: Small-bowel lesions (obstruction, hemorrhage, perforation and death) have occurred during therapy with enteric-coated formulations containing potassium, with or without thiazides. Such potassium formulations should be used with Salutensin only when indicated and should be discontinued immediately if abdominal pain, distension, nausea, vomiting or gastrointestinal bleeding occurs. Use cautiously, and only when deemed essential, in fertile, pregnant or lactating patients. *Use in Pregnancy:* Thiazides cross the placenta and can cause fetal or neonatal hyperbilirubinemia, thrombocytopenia, altered carbohydrate metabolism and possibly electrolyte disturbances. Fatal reactions may occur with reserpine during electroshock therapy; discontinue Salutensin 2 weeks before such therapy. Increased respiratory secretions, nasal congestion, cyanosis and anorexia may occur in infants born to reserpine-treated mothers.
Precautions: Azotemia, hypochloremia, hyponatremia, hypochloremic alkalosis and hypokaliemia (especially with hepatic cirrhosis and corticosteroid therapy) may occur, particularly with pre-existing vomiting and diarrhea. Potassium loss or protoveratrine A may cause digitalis intoxication. *Potassium loss responds to potassium-rich foods, potassium chloride or, if necessary, discontinuation of therapy. Stop therapy if protoveratrine A induces digitalis intoxication.* Serum ammonia elevation may precipitate coma in precomatose hepatic cirrhotics. Discontinue therapy 2 weeks before surgery or if myocardial irritability, progressive azotemia or severe depression occur. Exercise caution in patients with chronic uremia, angina pectoris, coronary thrombosis or extensive cerebral vascular disease *or bronchial asthma* and in those with a history of peptic ulceration or bronchial asthma; in post-sympathectomy patients; in patients on quinidine; and in patients with gallstones, in whom biliary colic may occur. Patients who have diabetes mellitus or who are suspected of being prediabetic should be kept under close observation if treated with this agent.
Adverse Reactions: Hydroflumethiazide: Skin rashes (including exfoliative dermatitis), skin photosensitivity, urticaria, necrotizing angiitis, xanthopsia, granulocytopenia, aplastic anemia, orthostatic hypotension (potentiated with alcohol, barbiturates or narcotics), allergic glomerulonephritis, acute pancreatitis, liver involvement (intrahepatic cholestatic jaundice), purpura plus or minus thrombocytopenia, hyperuricemia, hyperglycemia, glycosuria, malaise, weakness, dizziness, fatigue, paresthesias, muscle cramps, skin rash, epigastric distress, vomiting, diarrhea and constipation. *Reserpine:* Depression, peptic ulceration, diarrhea, Parkinsonism, nasal stuffiness, dryness of the mouth, weight gain, impotence or decreased libido, conjunctival injection, dull sensorium, deafness, glaucoma, uveitis, optic atrophy, and, with overdosage, agitation, insomnia and nightmares. *Protoveratrine A:* Nausea, vomiting, cardiac arrhythmia, prostration, blurring vision, mental confusion, excessive hypotension and bradycardia. (Treat bradycardia with atropine and hypotension with vasopressors.)
Usual Dose: 1 tablet b.i.d.
Supplied: Bottles of 60, 600, and 1000 scored 50 mg. tablets.

Salutensin®

hydroflumethiazide, 50 mg./reserpine, 0.125 mg. protoveratrine A, 0.2 mg.

BRISTOL LABORATORIES
Division of Bristol-Myers Company
Syracuse, New York 13201

The antihypertensive therapy that is easy to live with.*

When successive blood pressure readings confirm essential hypertension, consider Salutensin for:

Easy-to-live-with control. Gradual reduction of blood pressure leading to decisive, comfortable control is the common clinical response.

*Salutensin is usually well-tolerated (however, serious side effects can occur; see adjacent column for brief summary of prescribing information).

Easy-to-live with dosage. Two tablets a day usually achieves control. One to two tablets a day often maintains control without need for additional antihypertensive agents.

Easy-to-live with cost of therapy. The one to two tablets a day maintenance dose makes Salutensin economical to stay with. Important, because long-term control calls for long-term therapy.

Salutensin®

hydroflumethiazide, 50 mg./reserpine, 0.125 mg. protoveratrine A, 0.2 mg.




2
3
4
5
0

the night shift of depression... insomnia

Depression is a 24-hour-a-day problem. And insomnia is often its nocturnal expression. In fact, insomnia may be a key symptom in establishing the diagnosis of depression.

ELAVIL HCl (Amitriptyline HCl, MSD) may prove quite helpful when you have arrived at such a diagnosis. Unlike psychic energizers or agents that merely elevate mood, ELAVIL HCl embodies a mild antianxiety action which manifests itself even before the fundamental antidepressant activity of the drug becomes evident. Daytime drowsiness occurs in some patients, usually within the first few days of therapy.

NOTE: Not recommended during the acute recovery phase following myocardial infarction. Patients with cardiovascular disorders should be watched closely; arrhythmias, sinus tachycardia, and prolongation of the conduction time have been reported, particularly with high doses; myocardial infarction and stroke have been reported with drugs of this class. Close supervision is required for hyperthyroid patients or those receiving thyroid medication. Concurrent electroshock therapy may increase the hazards of therapy; such treatment should be limited to patients for whom it is essential. Discontinue the drug several days before elective surgery if possible.

Contraindications: Known hypersensitivity. Should not be given concomitantly with or within at least 14 days following the discontinuance of a monoamine oxidase inhibitor. Then initiate dosage of amitriptyline HCl cautiously with gradual increase in dosage until optimum response is achieved. Not recommended during the acute recovery phase following myocardial infarction or for patients under 12 years of age.
Warnings: May block the antihypertensive action of guanethidine or similarly acting compounds. Should be used with caution in patients with a history of seizures or urinary retention, or with narrow-angle glaucoma or increased intraocular pressure. Patients with cardiovascular disorders should be watched closely; arrhythmias, sinus tachycardia, and prolongation of the conduction time have been reported, particularly with high doses; myocardial infarction and stroke have been reported with drugs of this class. Close supervision is required for hyperthyroid patients or those receiving thyroid medication. May impair mental and/or physical abilities required for performance of hazardous tasks, such as operating machinery or driving a motor vehicle. Safe use during pregnancy and lactation has not been established; in pregnant patients, nursing mothers, or women who may become pregnant, weigh possible benefits against possible hazards to mother and child.
Precautions: When used to treat the depressive component of schizophrenia, psychotic symptoms may be aggravated; in manic-depressive psychosis, depressed patients may experience a shift toward the manic phase, and paranoid delusions, with or without associated hostility, may be exaggerated; in any of these circumstances, it may be advisable to reduce the dose of amitriptyline HCl, or to use a major tranquilizing drug, such as perphenazine, concurrently. When given with anticholinergic agents or sympathomimetic drugs, close supervision and careful adjustment of dosages are required. May enhance the response to alcohol and the effects of barbiturates and other CNS depressants. The possibility of suicide in depressed patients remains during treatment and until significant remission occurs; this type of patient should not have easy access to large quantities of the drug. Concurrent electroshock therapy may increase the hazards of therapy; such treatment should be limited to patients for whom it is essential. Discontinue the drug several days before elective surgery if possible.
Adverse Reactions: *Note:* Included in this listing are a few adverse reactions not reported with this specific drug. However, pharmacological similarities among the tricyclic antidepressant drugs require that each reaction be considered when amitriptyline is administered.
Cardiovascular: Hypotension, hypertension, tachycardia, palpitation, myocardial infarction, arrhythmias, heart block, stroke. *CNS and Neuromuscular:* Confusional states; disturbed concentration; disorientation; delusions; hallucinations; excitement; anxiety; restlessness; insomnia; nightmares; numbness, tingling, and paresthesias of the extremities; peripheral neuropathy; incoordination; ataxia; tremors; seizures; alteration in EEG patterns; extrapyramidal symptoms. *Anticholinergic:* Dry mouth, blurred vision, disturbance of accommodation, constipation, paralytic ileus, urinary retention, dilatation of urinary tract. *Allergic:* Skin rash, urticaria, photosensitization, edema of face and tongue. *Hematologic:* Bone marrow depression including agranulocytosis, eosinophilia, purpura, thrombocytopenia. *Gastrointestinal:* Nausea, epigastric distress, vomiting, anorexia, stomatitis, peculiar taste, diarrhea, parotid swelling. *Endocrine:* Testicular swelling and gynecomastia in the male, breast enlargement and galactorrhea in the female, increased or decreased libido. *Other:* Dizziness, weakness, fatigue, headache, weight gain or loss, increased perspiration, urinary frequency, mydriasis, drowsiness, jaundice. *Withdrawal Symptoms:* Abrupt cessation of treatment after prolonged administration may produce nausea, headache, and malaise; these are not indicative of addiction.
How Supplied: Tablets containing 10 mg and 25 mg amitriptyline HCl, in single-unit packages of 100 and bottles of 100, 1000, and 5000; tablets containing 50 mg amitriptyline HCl, in single-unit packages of 100 and bottles of 100 and 1000; for intramuscular use, in 10-cc vials containing per cc: 10 mg amitriptyline HCl, 44 mg dextrose, and 1.5 mg methylparaben and 0.2 mg propylparaben as preservatives.
For more detailed information, consult your MSD representative or see the Direction Circular. Merck Sharp & Dohme, Division of Merck & Co., Inc., West Point, Pa. 19486

when the diagnosis is depression

ELAVIL® HCl
(AMITRIPTYLINE HCl | MSD)

MSD MERCK SHARP & DOHME

The Remarkably Rigid Progression Of Alcoholism

In virtually every case of alcohol addiction there is a time-ordered sequence of progressive drinking. Alcoholism begins with "social drinking," then progresses to:

- ☐ Drinking at least once a week.
- ☐ Drinking faster and more than the "social drinker."
- ☐ Experiencing temporary amnesia, or "blackouts."
- ☐ Becoming more drunk than the "social drinker" (drug tolerance).
- ☐ Losing control over ability to stop drinking after the first drink.
- ☐ Going on periodic drinking bouts.
- ☐ Losing time from work.
- ☐ Protecting and hiding liquor supplies.
- ☐ Drinking alone in the morning or before breakfast.
- ☐ Getting the "shakes" and "butterflies" and finding liquor mediates them.
- ☐ Finding it takes less alcohol to get drunk, (less tolerance to the drug, probably due to brain damage).
- ☐ Experiencing delirium tremens, (D.T.'s).
- ☐ Feeling vague and unreasoned fears.
- ☐ Experiencing insomnia.
- ☐ Dying of liver, or brain, or heart disease, or debilitating diseases such as tuberculosis and pneumonia or accidents.

SCHICK
HOSPITAL

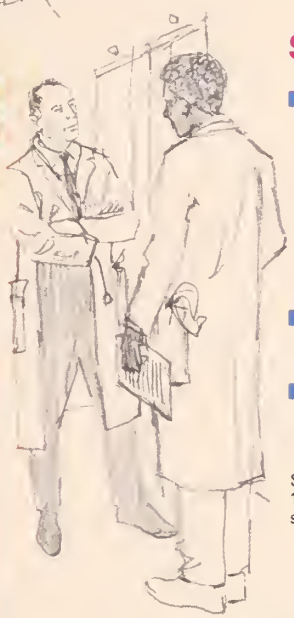
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Intensive 10-Day Treatment Program for Alcoholism . . . Based on the Addictive Concept

When Preventing Constipation is a Concern . . .







Consider

SURFAK®

dioctyl calcium sulfosuccinate

(stool softener)

Surfak prevents constipation:

- **naturally**
  - . . . without bowel distention
  - . . . without adding sodium to the system
  - . . . without requiring unusual intake of water
- **conveniently**—one 240 mg. capsule per day
- **economically**—costs less per effective daily dose*

Supplied: Bottles of 15, 100 (FSN 6505-926-8844) and 1000 (FSN 6505-890-1627) and Unit Dose 100's (10 x 10 strips).

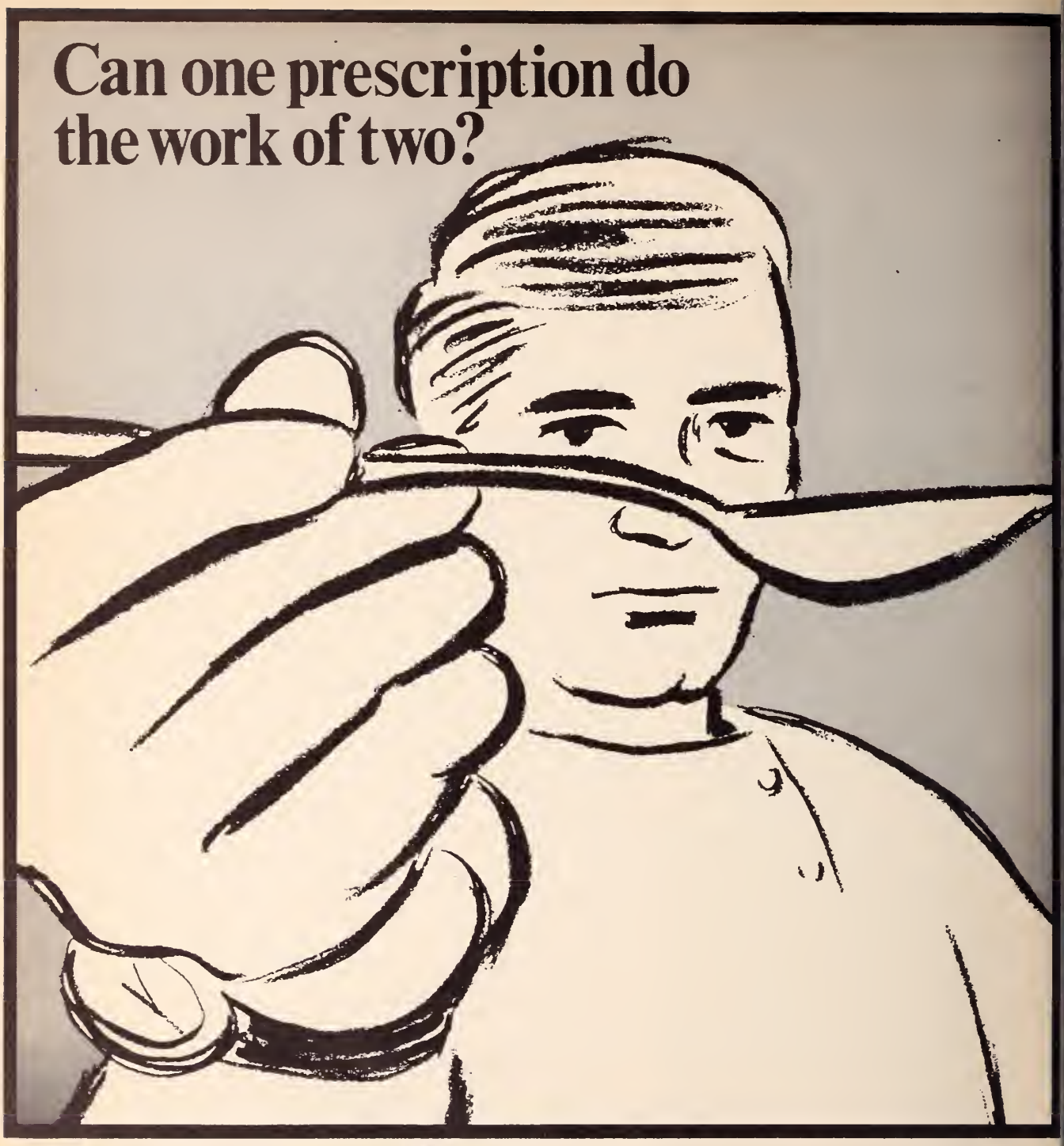


*based on actual drug store survey of prescribed dosages

HOECHST
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Somerville, N.J. 08876 U.S.A.

C-167

Can one prescription do the work of two?



Yes, Kolantyl®.

Kolantyl Gel/Wafers contain
aluminum hydroxide/magnesium hydroxide, and
Bentyl® (dicyclomine hydrochloride) too.

Merrell

The Wm. S. Merrell Company
Division of Richardson-Merrell Inc.
Cincinnati, Ohio 45215

0-2572 (21721





Hurricane Camille dumped up to 31 inches of rain on Virginia's Blue Ridge Mountains the night of August 19-20, 1969. She had already devastated the Gulf Coast from Louisiana to Florida, halted her northward journey over Kentucky and Tennessee, then headed eastward over West Virginia and Virginia.
Cooperative Farmer

Emotional stress can be just as destructive to the individual as turbulent, ravaging flood waters are to land and property. Solfoton will contribute to the maintenance of a mental climate for purposeful living.

Solfoton®

SEDATION WITHOUT DEPRESSION

EACH TABLET OR CAPSULE CONTAINS:

Phenobarbital.....16 mg.
(Warning: may be habit-forming)

Bensulfoid (See PDR).....65 mg.

Precaution: same as 16 mg. phenobarbital

DOSAGE: One tablet or capsule every 6 hours will sustain mild sedation.

Available in three forms to satisfy prescribing circumstances:

TABLETS	100s	500s	5000s
CAPSULES	100s	500s	1000s
TABLETS S/C	100s	500s	4000s

Federal law prohibits dispensing without prescription

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RICHMOND, VIRGINIA 23261
Manufacturers of Ethical Pharmaceuticals Since 1856

Thorazine®

brand of chlorpromazine

versatility
quality
experience

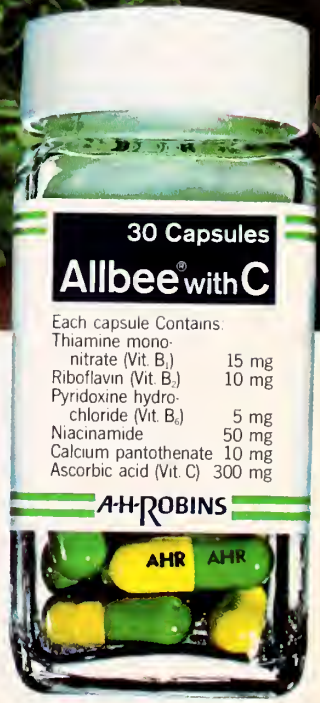


NOW THERE'S PRICE

Smith Kline & French Laboratories SK&F

2 ways to give your patients a month's therapeutic supply of Vitamin C:

40 pounds of spinach or 30 Allbee® with C



Although raw spinach is an excellent source of vitamin C, your patient would have to eat 40 pounds a month (about 1⅓ lbs. a day) to get as much ascorbic acid as is contained in just one bottle of 30 Allbee with C capsules (taken one capsule daily). If the spinach is cooked, a person would have to ingest more than twice as much because cooking destroys much of the vitamin C, and still more is lost when the liquid is drained off. Allbee with C also contains therapeutic amounts of B-complex vitamins. This handy bottle of 30 capsules gives your patient a month's supply at a very reasonable cost. Also the economy size of 100. Available at pharmacies on your prescription or recommendation.

A. H. Robins Company, Richmond, Va. 23220

A·H·ROBINS

vacation in
a vial:
the spasm
reactors
in your practice
deserve



"the Donnatal® Effect"

	each tablet, capsule or 5 cc. of elixir (23% alcohol)	each Donnatal No. 2	each Extentab®
hyoscyamine sulfate	0.1037 mg.	0.1037 mg.	0.3111 mg.
atropine sulfate	0.0194 mg.	0.0194 mg.	0.0582 mg.
hyoscine hydrobromide	0.0065 mg.	0.0065 mg.	0.0195 mg.
phenobarbital	(¼ gr.) 16.2 mg.	(½ gr.) 32.4 mg.	(¾ gr.) 48.6 mg.

(Warning: may be habit forming)

Brief Summary. Blurring of vision, dry mouth, difficult urination, and flushing or dryness of the skin may occur on higher dosage levels, rarely on usual dosage. Administer with caution to patients with incipient glaucoma or urinary bladder neck obstruction. Contraindicated in acute glaucoma, advanced renal or hepatic disease or a hypersensitivity to any of the ingredients.

A. H. ROBINS COMPANY, RICHMOND, VIRGINIA 23220

A·H·ROBINS

The girth control pill



Tepanil® Ten-tab®

(continuous release form)

(diethylpropion hydrochloride, N.F.)

When girth gets out of control, TEPANIL can provide sound support for the weight control program you recommend. TEPANIL reduces the appetite—patients enjoy food but eat less. Weight loss is significant—gradual—yet there is a relatively low incidence of CNS stimulation.

Contraindications: Concurrently with MAO inhibitors, in patients hypersensitive to this drug; in emotionally unstable patients susceptible to drug abuse.

Warning: Although generally safer than the amphetamines, use with great caution in patients with severe hypertension or severe cardiovascular disease. Do not use during first trimester of pregnancy unless potential benefits outweigh potential risks.

Adverse Reactions: Rarely severe enough to require discontinuation of therapy, unpleasant symptoms with diethylpropion hydrochloride have been reported to occur in relatively low incidence. As is characteristic of sympathomimetic agents, it may occasionally cause *CNS effects* such as insomnia, nervousness, dizziness, anxiety, and jitteriness. In contrast, CNS depression has been reported. In a few epileptics an increase in convulsive episodes has been reported. *Sympathomimetic cardiovascular effects* reported include ones such as tachycardia, precordial pain, arrhythmia, palpitation, and increased blood pressure. One published report described T-wave changes in the ECG of a healthy young male after ingestion of diethylpropion hydrochloride; this was an isolated experience, which has not been reported by others. *Allergic phenomena* reported include such conditions as rash, urticaria, ecchymosis, and erythema. *Gastrointestinal effects* such as diarrhea, constipation, nausea, vomiting, and abdominal discomfort have been reported. Specific reports on the hematopoietic system include two each of bone marrow depression, agranulocytosis, and leukopenia. A variety of miscellaneous adverse reactions have been reported by physicians. These include complaints such as dry mouth, headache, dyspnea, menstrual upset, hair loss, muscle pain, decreased libido, dysuria, and polyuria.

Convenience of two dosage forms: TEPANIL Ten-tab tablets: One 75 mg. tablet daily, swallowed whole, in midmorning (10 a.m.); TEPANIL: One 25 mg. tablet three times daily, one hour before meals. If desired, an additional tablet may be given in midevening to overcome night hunger. Use in children under 12 years of age is not recommended.

T-107/4/71/U S PATENT NO 3,001,910

THE NATIONAL DRUG COMPANY
DIVISION OF RICHARDSON-MERRELL INC
PHILADELPHIA, PENNSYLVANIA 19144



Painful night leg cramps...

unwelcome bedfellow for any patient– including those with arthritis, diabetes or PVD

One thing patients can sleep without, particularly patients with chronic disease conditions such as arthritis, diabetes or PVD, is painful night leg cramps. Although seldom the presenting complaint, night leg cramps can tie your patients up in painful knots. Now, just one tablet of QUINAMM at bedtime can usually bring an end to shattered sleep and needless suffering. Your patients will sleep restfully—gratefully—with QUINAMM, specific therapy to prevent painful night leg cramps.

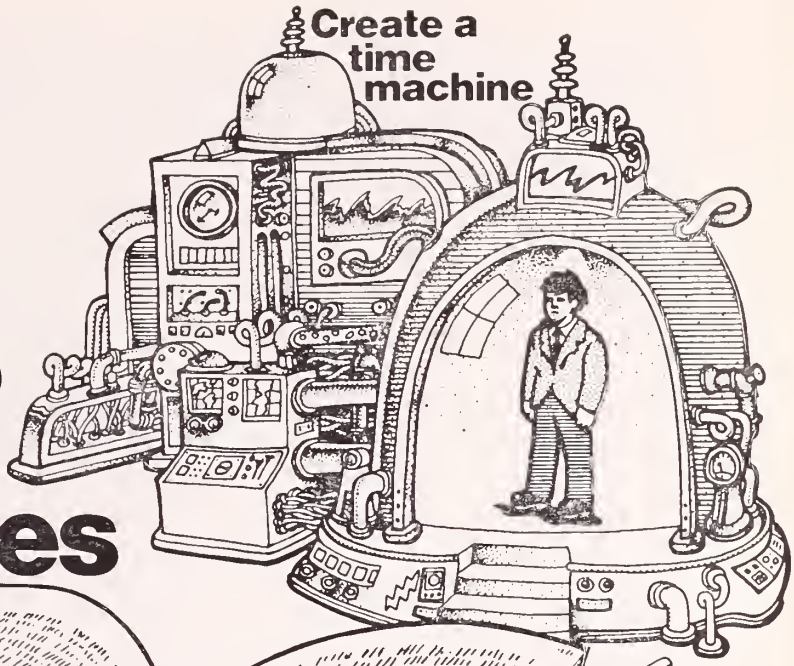
Prescribing Informotion—Composition: Each white, beveled, compressed tablet contains: Quinine sulfate, 260 mg., Aminophylline, 195 mg. **Indicotions:** For the preventian and treatment of nocturnal and recumbency leg muscle cramps, including those associated with arthritis, diabetes, varicose veins, thrombophlebitis, arteriosclerosis and static foot deformities. **Controindicotions:** QUINAMM is contraindicated in pregnancy because of its quinine content. **Precautions/Adverse Reactions:** Aminophylline may produce intestinal cramps in some instances, and quinine may produce symptoms of cinchonism, such as tinnitus, dizziness, and gastrointestinal disturbance. Discontinue use if ringing in the ears, deafness, skin rash, or visual disturbances occur. **Dosage:** One tablet upon retiring. Where necessary, dosage may be increased to one tablet following the evening meal and one tablet upon retiring. **Supplied:** Bottles of 100 and 500 tablets.

THE NATIONAL DRUG COMPANY
DIVISION OF RICHARDSON-MERRELL INC.
PHILADELPHIA, PENNSYLVANIA 19144

Quinamm™ Specific therapy for night leg cramps
(quinine sulfate 260 mg., aminophylline 195 mg.)

Q103 2/71

What to do until suppositories work:





Actually, on the average, evacuant suppositories take about an hour to work.[1-3] Sometimes two.[4] Sometimes more.[3] Also, suppositories can be ineffective in up to 38% of patients,[5] and not infrequently produce smarting, burning and tenesmus.[6]

Alternative to the long unpleasant wait: FLEET® ENEMA.

FLEET ENEMA works within 2 to 5 minutes without pain or spasm. FLEET ENEMA induces a physiological pattern of evacuation, unlike purgatives and laxatives that may liquefy the stool. FLEET ENEMA avoids the irritation common with soapsuds enema. And FLEET ENEMA is leakproof: a rubber diaphragm at the base of the prelubricated tube prevents seepage and controls the rate of flow, assuring comfortable administration.

FLEET ENEMA. Regular and pediatric. Both completely disposable—like suppositories, only better. Much better.



C. B. FLEET CO., INC
Lynchburg, Va. 24505

Fleet pharmaceuticals

Warning: Frequent or prolonged use of enemas may result in dependence. Take only when needed or when prescribed by a physician. Do not use when nausea, vomiting or abdominal pain is present. **Caution:** Do not administer to children under two years of age unless directed by a physician.

References: 1. Blumberg, N.: Med Times 91:45, Jan., 1963. 2. Sweeney, W. J., III: Amer J Obstet Gynec 85:908, Apr. 1, 1963. 3. Weinsaft, P.: J Amer Geriat Soc 12:295, Mar., 1964 4. Baydoun, A. B.: Amer J Obstet Gynec 85:905, Apr. 1, 1963. 5. Feder, I. A., Flores, A. and Weiss, J.: Amer J Gastroent 33:366, Mar., 1960. 6. Smith, J. J. and Schwartz, E. D.: Western J Surg 72:177, May-June, 1964



Not too little, not too much... but just right!

"Just right" amounts of Ilosone Liquid 250
can be dispensed easily from the pint bottle in *any* quantity
you specify to meet your patients' precise needs—
without regard to package size.

ready-mixed
Ilosone® Liquid 250

Erythromycin Estolate

(equivalent to 250 mg. of base per 5-ml. teaspoonful)

Additional information available to the profession on request.
Eli Lilly and Company
Indianapolis, Indiana 46206

Lilly

100204

Read this Bill...House Bill No 1384

IT IS A bad bill. It was authored and introduced by Rep. Heber Finch, Jr., of Sapulpa, Oklahoma. Paid lobbyists are at work soliciting the support of members of both houses of the state legislature.

AS INTRODUCED: AN ACT RELATING TO INSURANCE . . .

SECTION 1. Services or procedures covered by the terms of any individual, group, blanket, franchise policy, nonprofit contract or agreement, whatsoever, providing accident or health benefits hereafter renewed or issued for delivery in Oklahoma by any issuer, whether a stock or mutual insurance company, a medical service corporation or association or nonprofit group, or any other type of issuer whatever, and covering an Oklahoma risk, may be performed by any practitioner licensed under the healing arts selected by the insured, or by his parent or guardian, if he be a minor, who is duly licensed under the laws of this state to perform such services or procedures, and said practitioner shall be equally compensated for such services on the basis of charges prevailing in the same community for similar services or precedures to like ill or injured persons regardless of the branch of the healing arts to which he may belong.

SECTION 2. Services or procedures covered by the terms of Section 1, hereof, may be performed at any hospital, doctor's office or clinic at the choice of the insured, or his parent or guardian, and the practitioner of the healing arts who is performing such service or procedure.

SECTION 3. Any provision, exclusion or limitation denying an insured, or his parent or guardian, the free choice of such licensed practitioner of the healing arts, or the use of any hospital, doctor's office or clinic shall, to the extent of the denial, be void, but such voidance shall not affect the validity of the other provisions of the policy, plan or agreement . . .

Introduced as "AN ACT RELATING TO INSURANCE . . . " it actually is an act relating to the prevailing definition of the term 'healing arts,' the right of a provider to define that which he will provide and the place where it will be provided, the rights of hospital employees to refuse to promote a cult and to the very existence of hospitals as health care facilities throughout the state.

Imagine, if you can, a well equipped general hospital filled with the 'patients' of licensed practitioners of the healing arts who, by law, cannot perform surgery, administer or prescribe antibiotics or nonproprietary drugs; who do not accept the germ theory of disease, who insist that all illness has but a single cause and who, therefore, would have no need for the many special diagnostic facilities of the hospital; who prescribe and provide a single form of 'treatment' for all ailments and illnesses and would, therefore, find no use for the pharmacy, the operating room, the intensive care unit, the radiotherapy department or any of the skilled and highly trained personnel supporting these facilities. Why would such practitioners put their patients in hospitals? What needs exist and which would be satisfied through hospitalization? And for what would the insuror pay?

Politically, HB 1384 is understable. Its provisions are inane. The folly of its enactment would create an instant plague across the state, close virtually every hospital, make it impossible to obtain health insurance in Oklahoma and pose the greatest menace to the public health since smallpox and typhoid fever ravaged our Indian and pioneer forebearers.

If we are dedicated to the welfare of our patients; if we are concerned with providing effective health care for our community; if we practice preventive medicine, we must work to defeat HB 1384. It is a threatening pestilence.

And while we're at it, let's change the definition and qualifications of the 'licensed practitioner of the healing arts.' Politics notwithstanding, there is no groundswell for the preservation and propagation of cultism in Oklahoma, 1971. *MRJ* □



To undermine mutual trust and replace common goals are the destructive evils of Socialism. How much division can an organization tolerate and remain active as a unit, one can but surmise. The only real appeal Socialism has is that somehow one's present position just might be improved. The best way to combat present status is through work, initiative and enterprise. These principles are stiffled and stalemated under Socialism. Around every corner, in every recess awaits further orders and instructions from a merciless hierarchy. Think, if you will, what life would be like without competition. The sheer joy of mastery of a problem can only be summed up thus—"The only reward for a job well done is to have done it."

We have all observed the gradual vice-like grip of bureaucracies' evil noose. Our fees have been cut without recourse. "Federal regulations" they say, and we are supposed to roll over and feign acceptance. Only one call per visit to the Nursing Home will be paid the regular fee, we are told.

In my lifetime I have observed the plight of the American farmer. One of his main activities now consists of running to the local board, consulting maps to be sure he is in compliance and really subject to severe fine and penalty should he venture out of the subscribed area. It can, and is, happening to us. Subsidies is the word the bureaucrat has for it in most areas; ours, at the present, is "capitation basis." I have stoutly and vigorously maintained that Oklahoma problems are unique to Oklahoma and must be solved by us. Grass roots level seems the place to solve medicine's woes, not orders from Capital Hill.

As Omar, the tentmaker, once said "the moving hand doth write, and having writ moves on." Personally this year has been very rewarding by your continued support. I leave office more impressed by the individual physician and the job he is doing. His integrity, foresight and sense of fair play continue to inspire me.

Your new president, Doctor Pascucci, is a man of sterling character, principles and ability. He merits your cooperation. He will have mine. □

Sincerely,

E. L. Calhoon M. D.

OSMA JOURNAL/scientific

Combined Surgical and Irradiation Treatment of Invasive Carcinoma of the Cervix

JOSEPH W. FUNNELL, M.D.
Deceased January 31st, 1971
JOSEPH W. KELSO, M.D.
JAMES D. FUNNELL, M.D.

A 24-year review of 230 previously untreated cases of invasive carcinoma of the cervix are reported. The overall results and especially results of cervical stumps, pregnancy and adenocarcinoma of the cervix plus a 59 percent five-year survival of 51 cases of proven lymph node metastasis warrants world wide comparison.

WE HAVE TREATED, during the twenty-four years from December 1945 to December 1969, 282 patients with invasive carcinoma of the cervix, by a method employing both the surgical and irradiation modalities of treatment.

This method of treatment was undertaken in December 1945 because of our dissatisfaction with the results of irradiation treatment alone, the then generally accepted method.

This paper was presented by Joseph W. Funnell, M.D., to the International Cancer Congress, Houston, Texas, May 22nd-29th, 1970.

We felt that, because cervical cancer usually remains localized in the pelvis until relatively late in the course of the disease, surgery should have a place in its treatment. However, we recognized the fact that cancer surgery is a macroscopic approach to a microscopic disease and that, despite the most meticulous dissection, small foci of malignant cells might be left in situ or there could be microscopic extension of cancer beyond the surgical field. To overcome this surgical shortcoming, we elected to treat our patients postoperatively with total pelvic irradiation.

This method encompassing both the surgical and irradiation modalities of treatment we believed in 1945, and are *now* certain, offers operable patients with invasive carcinoma of the cervix a better opportunity to be cured than either method alone.

METHOD OF TREATMENT

Surgical

1. Radical en bloc extrafascial total abdominal hysterectomy and bilateral salpingo-oophorectomy, with removal of the parametrial tissue from pelvic wall to pelvic wall and from the bladder anteriorly to the rectum posteriorly, along with the upper one-third to

one-half of the vagina, depending upon the extent of the lesion.

2. A meticulous pelvic lymphadenectomy.

Irradiation

1. Started three to four weeks postoperatively.
2. 4,000 to 6,000 roentgen units to the entire pelvis delivered by supervoltage or cobalt teletherapy units.
3. In the earlier days of this study, the total pelvic dosimetry was somewhat less, being limited by the then available therapy equipment.

MATERIAL

Two hundred and eighty-two patients with biopsy diagnosis of invasive carcinoma of the cervix, treated surgically followed by postoperative irradiation during the twenty-four years from December 1, 1945 to December 1, 1969, provide the material for this report.

All cases were staged, according to the International Classification of carcinoma of the cervix, by one of the authors. In each case, if it were judged that the lesion could be completely surgically removed and there were no evidence by preoperative studies or at the time of surgery of metastasis beyond the pelvis, the patient was included in this series.

In *Table I* the total number of patients treated and their staging are listed. Seventy-three percent of these patients are from our private practice and twenty-seven percent from the charity services of various hospitals in our community.

There was absolutely *no selection* other than the operability and all Stage I, Stage II, and a few Stage III cases who consulted us or whom we saw in consultation during this twenty-four year period are included.

Table I
PATIENTS TREATED
December 1, 1945 to December 1, 1969

INTERNATIONAL CLASSIFICATION	
STAGE I	155
STAGE II	109
STAGE III	18
TOTAL	282

Table II
AGES OF PATIENTS TREATED
December 1, 1945 to December 1, 1969

Age	No. of Cases	Percentage
15-20	1	.35
21-29	26	9.21
30-39	85	30.14
40-49	67	23.76
50-59	57	20.21
60-69	38	13.48
70-80	8	2.84
TOTAL TREATED	282	

73.4% of these cases came from our private practice. 23 cases were 65 years old or above and would have been denied surgery in most clinics. One was an operative mortality.

Table II and Table III list the ages and weights of the patients treated, indicating the absence of selectivity. The number and staging of these cases also indicates there was no selection of patients. It is to be noted that operable patients with invasive carcinoma of the cervix complicating pregnancy, carcinoma of the cervical stump and adenocarcinoma of the cervix are included.

Every case was operated by one of the authors. The preoperative staging was never changed regardless of the operative findings.

All patients once included in the series remained in the series regardless of the ensuing circumstances. All patients who died following the institution of therapy have been considered as dying of cancer regardless of the cause. Likewise, all patients lost

Table III
WEIGHTS OF PATIENTS TREATED
December 1, 1945 to December 1, 1969

Weights of Patients	No. of Cases	Percentage
75-100	13	4.61
100-125	91	32.27
125-150	86	30.50
150-175	60	21.29
175-200	20	7.10
200-225	6	2.13
225-250	3	1.08
300 and above	1	0.36
TOTAL TREATED	282	

One case—weight not recorded
One case—not weighed—paraplegia secondary to spina bifida
Approximately 10% of these cases would have been denied surgery on account of weight alone in many clinics.

to followup have been considered as dying of cancer and are so reflected in our statistics.

RESULTS

The results of this method of treatment may be evaluated, as measured in percentage of survival without evidence of recurrence, in five-, ten-, fifteen-, and twenty-year groups of patients. In this way not only are we able to evaluate the five-year results, which is the acceptable time interval for comparing different modalities of treatment of cancer, but we can also evaluate the long-range results of treatment. These results are reflected not only in survival but in the useful lives these patients lead following therapy, indicating that their future health is little or any altered.

Table IV
5-YEAR SURVIVAL
CARCINOMA OF THE CERVIX
WITHOUT EVIDENCE OF RECURRENCE
December 1, 1945 to December 1, 1964

Stage	Patients Treated	Dead	Survival	Percentage
I	130	20	110	84.61
II	91	20	71	78.02
III	9	2	7	77.77
TOTAL	230	42	188	81.74

Combined 5-year Survival Stage I and Stage II 81.90

Five-Year Survival Without Evidence of Recurrence

Table IV summarizes the five-year results of treatment and the status of the patients by stages.

It will be noted that 52 patients have been deleted from this analysis because of persistent or recurrent disease present at the time of surgery. This leaves a total of 230 untreated patients who were operated five or more years ago. One hundred and thirty were Stage I lesions and of these 110, or 84.61 percent, are alive without evidence of recurrence for five or more years. Ninety were Stage II lesions. Of these, 71, or 78.02 percent, are alive and well at five or more years. Nine were Stage III lesions and of these seven, or 77 percent, survived five or more years.

The combined five-year survival of Stage I and Stage II cases without evidence of recurrence is 81.90 percent.

In a non-selected group of patients, these statistics, we believe, bear out our conviction that in skilled hands this method of treatment offers patients with invasive carcinoma of the cervix as good, if not better, chance of cure than any heretofore reported.

Ten-Year Survival Without Evidence of Recurrence

Table V summarizes the 10-year results

A 1949 graduate of the University of Oklahoma School of Medicine, Joseph W. Funnell, M.D., was a Diplomate of the American Board of Obstetrics and Gynecology and a Fellow of the American College of Surgeons. He was Head of the Department of Obstetrics and Gynecology at Mercy Hospital in Oklahoma City, a member of the American College of Obstetrics and Gynecology, the Central Association of Obstetricians and Gynecologists, the Southern Medical Association and the Oklahoma City Obstetrics and Gynecology Society. He was also a member of the Alpha Omega Alpha, the Phi Chi and Osler Society.

Joseph W. Kelso, M.D., was graduated from the State University of Iowa College of Medicine in 1925. In addition to his private practice in Oklahoma City, he is Professor Emeritus of Gynecology at the University of Oklahoma Medical Center. He is a Diplomate of the American Board of Obstetrics and Gynecology, a Fellow of the American College of Obstetricians and Gynecologists, a member of the Central Association of Obstetricians and Gynecologists, the Pan-Pacific Surgical Association, the Pan-American Medical Association and the Southern Medical Association.

In 1960, James D. Funnell, M.D., received his medical degree from the University of Oklahoma School of Medicine, where he is now Assistant Clinical Professor of Obstetrics and Gynecology. His medical affiliations include the American College of Obstetrics and Gynecology, the Central Association of Obstetrics and Gynecology, the Southern Medical Association, the American Society of Fertility and Sterility and the Alpha Omega Alpha.

Table V
10-YEAR SURVIVAL
CARCINOMA OF THE CERVIX
WITHOUT EVIDENCE OF RECURRENCE
December 1, 1945 to December 1, 1959

Stage	Patients Treated	Dead	Survival	Percentage
I	113	27	86	76.11
II	92	25	67	72.83
III	6	2	4	66.66
TOTAL	211	54	157	74.40

9 cervical stump cases and 12 cases complicating pregnancy are A&W.
34 cases with proven lymph node metastasis 15 Stage I—9 A&W
23 Stage II—11 A&W. Combined Stage I and II—52.63%
4 Stage III—3 A&W
11 cases of adenocarcinoma—6 A&W—54.54% survival

of treatment and the status of patients by stages.

Of the total of 230 patients 211 were treated ten years ago or more. One hundred and thirteen were Stage I lesions. Of these, 86, or 76.11 percent, are alive and well after ten or more years. Ninety-two were Stage II lesions. Of these, 67, or 72.83 percent, are alive and well after ten or more years. Six were Stage III lesions. Of these, four, or 66.66 percent, are alive and well after ten or more years.

The combined ten-year survival rate of Stage I and Stage II cases is 74.47 percent. This is only seven percent less than the five-year survival and establishes that when

Table VI
15-YEAR SURVIVAL
CARCINOMA OF THE CERVIX
WITHOUT EVIDENCE OF RECURRENCE
December 1, 1945 to December 1, 1954

Stage	Patients Treated	Dead	Survival	Percentage
I	76	17	59	77.63
II	57	21	36	63.16
III	3	1	2	66.66
TOTAL	136	39	97	71.32

3 Stage I lost to follow-up and considered dead
10 Stage I cases had proven lymph node metastasis —8 A&W
21 Stage II cases had proven lymph node metastasis —11 A&W
3 Stage III cases had lymph node metastasis—2 A&W
6 cases had bilateral lymph node metastasis—4 A&W today

Table VII
20-YEAR SURVIVAL
CARCINOMA OF THE CERVIX
WITHOUT EVIDENCE OF RECURRENCE
December 1, 1945 to December 1, 1949

Stage	Patients Treated	Dead	Survival	Percentage
I	29	6	23	79.31
II	15	7	8	53.33
TOTAL	44	13	31	70.46

3 Stage I cases had proven lymph node metastasis —2 A&W
7 Stage II cases had proven lymph node metastasis —4 A&W
4 cases complicated by pregnancy all are A&W
6 cases with proven bilateral node metastasis—4 are A&W

treated by this method, patients are usually cured not just palliated for a period of time.

Fifteen-Year Survival Without Evidence of Recurrence

Table VI summarizes the 15-year results of treatment and the status of the patients by stages. Seventy-six were Stage I and of these, 59, or 77.63 percent, are alive and well. Fifty-seven were Stage II and of these, 36, or 63.16 percent are alive and well.

The combined Stage I and II 15-year survival is 71.4 percent, which is only three percent less than the 10-year survival, again demonstrating the fact that once treated and past the immediate post-treatment period, persistent or recurrent malignancy is almost non-existent.

Twenty-Year Survival Without Evidence of Recurrence

Table VII summarizes the 20-year results

Table VIII
5-YEAR SURVIVAL
PATIENTS WITH PROVEN PELVIC LYMPH NODE METASTASIS WITHOUT EVIDENCE OF RECURRENCE
December 1, 1945 to December 1, 1964

Stage	Patients Treated	Dead	Survival	Percentage
I	14	6	8	57.14
II	28	13	15	53.57
III	9	2	7	77.77
TOTAL	51	21	30	59.00

Metastasis demonstrated in 51 of 230 cases 22.17%
Metastasis demonstrated in 14 of 130 Stage I cases 10.77%
Metastasis demonstrated in 28 of 91 Stage II cases 30.76%
Metastasis demonstrated in 7 of 9 Stage III cases 77.77%

Table IX
5-YEAR SURVIVAL
CARCINOMA OF THE CERVIX COMPLICATING PREGNANCY WITHOUT EVIDENCE OF RECURRENCE
December 1, 1945 to December 1, 1964

Stage	Patients Treated	Dead	Survival	Percentage
I	9	0	9	100%
II	4	0	4	100%
TOTAL	13	0	13	100%

CARCINOMA OF THE CERVICAL STUMP WITHOUT EVIDENCE OF RECURRENCE

Stage	Patients Treated	Dead	Survival	Percentage
I	8	0	8	100%
II	7	0	7	100%
TOTAL	15	0	15	100%

of treatment and the status of patients by stages. A total of 44 patients are in this group and 31 are alive and well twenty years or more after treatment. Twenty-nine of the 44 cases were Stage I and of these, 23, or 79.31 percent, are alive and well twenty or more years after treatment. Fifteen of the 44 were Stage II cases and of these, eight, or 53.33 percent, are alive and well.

The combined 20-year survival rate is 70.46 percent, which is truly phenomenal if one considers that many of these women treated twenty to twenty-four years ago are now quite elderly and subject to all of the ills of the aged.

This group is also unique in that the world literature is almost devoid of reports of patients whose treatment was started over twenty years ago and whose lives have been closely followed for this length of time.

Five-Year Survival in Patients with Microscopically Proved Pelvic Lymph Node Metastasis

Table VIII outlines the results in 51, or 22.17 percent, of the 230 patients treated over five years ago in whom pelvic lymph node metastases was microscopically demonstrated. Thirty, or 59 percent, of these 51 patients were alive without evidence of recurrence five or more years. Fifteen, or 10.77 percent, of Stage I cases had lymph node metastases. Of these, eight, or 57.15 percent, were alive without evidence of recurrence after five or more years.

Twenty-eight, or 30.76 percent, of Stage II cases had lymph node metastases. Of these, 15, or 53.68 percent, were alive and without evidence of recurrence five or more years. Nine, or 50 percent, of the Stage III cases had lymph node metastases. Of these, seven, or 77 percent, were alive without evidence of recurrence after five or more years.

This group of patients proves beyond a doubt that radical surgery followed by therapeutic total pelvic irradiation can cure over 50 percent of patients with pelvic lymph node metastases.

Five-Year Survival in Patients with Invasive Carcinoma of the Cervix Complicating Pregnancy

Our belief is that patients with invasive carcinoma of the cervix complicating pregnancy, either during pregnancy or in the immediate postpartum period, should be treated in exactly the same way as they would have been were they not pregnant.

Table IX shows that 13, or 6.5 percent, of our 230 patients treated over five years ago were pregnant or in the immediate postpartum period when therapy was instituted. One hundred percent were alive and well five years or more after treatment.

Many physicians, even today, consider patients with invasive carcinoma of the cervix complicating pregnancy as having an almost hopeless problem.

The record of this group of 13 patients, we believe, is without equal and, because of this, we urge the adoption of our method of treatment for invasive carcinoma of the cervix complicating pregnancy.

Five-Year, or more, Survival in Invasive Carcinoma of the Cervical Stump

Table IX also summarizes the results of treatment of invasive carcinoma of the cervical stump. Fifteen of 230 patients treated five or more years ago were diagnosed as having invasive carcinoma of the cervical stump. Eight were Stage I and seven were Stage II cases. All 15, or 100 percent, survived five or more years and, in fact, are alive and well at the time of this report.

Supracervical hysterectomies now are rarely done; consequently carcinoma of the cervical stump is seldom encountered. However, when this diagnosis is made the patient should be treated in the manner which will give her the best possible chance of

Table X
5-YEAR SURVIVAL
ADENOCARCINOMA OF THE CERVIX
WITHOUT EVIDENCE OF RECURRENCE
December 1, 1945 to December 1, 1964

Stage	Patients Treated	Dead	Survival	Percentage
I	8	1	7	87.5%
II	5	3	2	40.0%
III	2	0	2	100%
TOTAL	15	4	11	73.33%

15, or 6.25%, of total patients treated, 3 of the 15, or 20%, had pelvic lymph node metastasis. 2 of the 3 are alive and well after 5 or more years.
The combined survival rate of 73.33% is only 8.41% less than the overall 5-year survival of 81.74% for the entire series.

cure by a method that is not prohibited by frequent major complications.

When patients with carcinoma of the cervical stump are treated by irradiation alone, the results are little better than they were twenty-five years ago. Also, in those methods of irradiation that employ radium or radioactive material applied to the cervix, complications are frequent due to irradiation hot spots of intestines and bladder with resulting fistulae and intestinal obstruction due to adherence of these structures to the cervical stump. For these reasons, we are convinced that the surgical approach followed by external radiation is the treatment of choice for invasive carcinoma of the cervical stump.

Five-Year Survival in Patients with Adenocarcinoma of the Cervix

In Table X are summarized the results of treatment of adenocarcinoma of the cervix and the status of patients by stages.

It can be seen that of our 230 cases treated five or more years ago, 15 or 6.5 percent were primary adenocarcinoma of the cervix. There were eight Stage I, five Stage II and two Stage III cases.

The combined five-year survival rate is 73.33 percent, which points out the fact that adenocarcinoma of the cervix is a more lethal disease than squamous cell carcinoma of the cervix.

We fully agree with developing opinion that adenocarcinoma of the cervix is best treated surgically. We are also convinced, from our results, that total external pelvic irradiation is of value and should be utilized.

COMPLICATIONS

We have encountered complications similar in number and kind as reported by others doing radical pelvic surgery. They have included pulmonary emboli, hemorrhage, sepsis, shock, cardiac arrest, and urinary tract fistulae.

Urinary tract fistulae have occurred in 9.22 percent of our patients and 50 percent of these have healed spontaneously with the aid of splinting ureteral catheters and proper bladder drainage. There has been none we could not manage.

Operative deaths occurred in nine pa-

Table XI
5-YEAR SURVIVAL

COMPARATIVE RESULTS of clinics utilizing only RADIATION treatment in invasive carcinoma of the cervix as reported in *Volume 14 Annual Report of Results of Treatment of the Uterus and Vagina*, with the series of Doctors Funnell, Kelso and Funnell utilizing the COMBINED SURGERY AND POSTOPERATIVE IRRADIATION.

	STAGE I		STAGE II		STAGE I & II	
	No. Cases	Percent	No. Cases	Percent	No. Cases	Percent
J. W. Funnell, J. W. Kelso, and J. D. Funnell	130	84.61	91	78.02	221	81.90
Stockholm	471	86.4	1094	60.0	1565	67.92
Manchester	311	69.5	942	46.6	1253	52.31
Gliwise, Poland	377	62.9	892	47.2	1269	51.85
Paris Institute of Radium	71	78.9	414	54.3	485	58.84
University Pennsylvania	83	83.1	57	54.4	140	71.43
M. D. Anderson *G. H. Fletcher	271	90.3	647	72.6	918	77.8

*M. D. Anderson Statistics obtained in personal communication from G. H. Fletcher by Joseph W. Kelso.

tients, all operated early in the series. Improved surgical technique, improved anesthesia, and improved management of catastrophic operative complications have essentially eliminated operative deaths. Our last —from cardiac arrest—was in 1957.

CONCLUSION

We are convinced, after studying our results and reviewing the literature, that in skilled hands the extended Wertheim hysterectomy and pelvic lymphadenectomy, followed by total pelvic irradiation, gives patients with operable invasive carcinoma of the cervix a better opportunity to be cured than does either method alone.

Table XI—This conclusion is validated by a comparison of our results with those reported in *Volume* 14, *Annual Report of Results of Treatment of Carcinoma of the Uterus and Vagina,* which reveals them to be as good or better than the majority therein reported.

Due to the fact that most clinics previously using surgery alone in the treatment of invasive carcinoma of the cervix have recently been utilizing radiation postoperatively, meaningful statistics are almost nonexistent for surgery alone in this disease in *Volume 14, Annual Report on the Results of Treatment of Carcinoma of the Uterus and Vagina.*

Further substantiation of this conclusion is gained by noting our long-range results in the 10, 15, and 20-year groups of patients. These results document the fact that patients treated by this method are usually cured, not just palliated for a time to die later of persistent carcinoma. Indeed, considering the age group treated, one would expect a greater number to have been lost through the attrition of age than has occurred from all cases.

By observing the useful lives they lead, we know that once treated the future health of these patients is little if any altered. This cannot be said when irradiation alone, in huge doses, is used.

Finally, we urge gynecologists throughout the world to consider this method of treatment for operable invasive carcinoma of the cervix. We especially urge the adoption of this method of treatment in invasive carcinoma of the cervix complicating pregnancy, carcinoma of the cervical stump, and in adenocarcinoma of the cervix.

1211 North Shartel, Oklahoma City, Oklahoma 73103

BEN H. NICHOLSON MEMORIAL LECTURESHIP

J. C. Peterson, M.D., Professor of Pediatrics and Chairman of the Department, Marquette School of Medicine, Milwaukee, Wisconsin, will give the *Ben H. Nicholson Memorial Lecture* on Thursday, April 22, 1971, 4:00 p.m., at the Student Education Building, University of Oklahoma Medical Center, Oklahoma City, Oklahoma. The lectureship has been established in memory of Doctor Ben H. Nicholson, long-time practicing pediatrician in Oklahoma City and faculty member since 1931, who died in 1968. All physicians are cordially invited to attend. Further details can be obtained from: The Department of Pediatrics, Children's Memorial Hospital, University of Oklahoma Medical Center, 800 Northeast 13th, Oklahoma City, Oklahoma 73104. □


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Brief Summary

Indications

Erythrocin is indicated against gram-positive cocci — staphylococci (most strains), pneumococci and streptococci (including enterococci). Active against other pathogens, such as *Corynebacterium, Hemophilus, Clostridium, Neisseria,* and *Treponema pallidum,* the agents causing trachoma and lymphogranuloma venereum and primary atypical pneumonia caused by *Mycoplasma pneumoniae* (Eaton agent). Establish susceptibility of pathogenic organism when practical. Maintain therapeutic levels for ten days in the treatment of streptococcal infections to help prevent rheumatic fever and glomerulonephritis. Also consider local measures or surgery whenever indicated.

Contraindications

Known hypersensitivity to erythromycin. I.M. preparation also contraindicated in patients hypersensitive to the "caine" type of local anesthetics.

Precautions, Side Effects

Occasionally abdominal discomfort, cramping, nausea or vomiting may occur; generally controlled by reduction of dosage. Mild allergic reactions, such as urticaria and other skin rashes, may occur. Serious allergic reactions have been extremely infrequent; if hypersensitivity is encountered consider appropriate countermeasures, e.g., epinephrine, steroids, etc., and withdraw drug. The rare possibility of overgrowth of nonsusceptible organisms should be kept in mind; if it occurs withdraw drug and institute appropriate treatment. Local venous discomfort, generally mild, may occur with I. V. administration. I.M. preparation is suitable for deep intramuscular administration only; restrict use in children with small muscle mass. A mild transient local discomfort sometimes occurs following rectal insertion of Erythrocin Suppositories; discontinue if significant discomfort persists.

Administration and Dosage

I. ORAL: In adults with mild to moderate infections caused by readily-susceptible organisms 1.0 Gm. daily; more severe infections or those caused by less susceptible organisms 2.0 Grams daily; unusually severe infections up to 4 or more Gm./day. Daily dose in children is 15 to 25 mg./lb./day depending upon severity of infection. Daily dose should be administered in divided doses at 4-to-6 hour intervals. Continue treatment for at least 48 hours after symptoms have subsided and temperature has returned to normal. In fulminating or life-threatening infections, a parenteral form of erythromycin is preferred.

II. PARENTERAL: Intravenous administration may be continuous or intermittent (6 to 8 hour intervals): 1 to 4 Gm. daily in adults; 15 to 25 mg./lb./day in children, depending upon severity of infection. Recommended I.M. dose is 100 mg. (2 ml.) for adults, 50 mg. (1 ml.) for children 30 lbs. or more and 1.4 to 1.8 mg./lb. in smaller children. Injections are usually given at 6 to 8 hour intervals; may be given at 4 to 6 hour intervals for severe infections.

III. RECTAL: Following therapeutic doses are recommended in children: to 20 lbs., 1-125 mg. suppository every 8 hours; 20 to 40 lbs., 1-125 mg. suppository every 6 hours.

Change to oral therapy as soon as practicable.

103305

Ocular Vascular Accidents

HUNTER L. LITTLE, M.D.

Ocular vascular accidents present a perplexing problem to the physician. They demand immediate ophthalmological attention, and when therapy is indicated, it must be prompt to be effective. Underlying systemic disease must be pursued.

SUDDEN LOSS of vision is an ophthalmological emergency. Ocular vascular accidents represent a most dramatic cause for sudden loss of vision and demand immediate attention.

Central retinal artery occlusion is diagnosed by the presence of diffuse white retinal edema, markedly attenuated retinal arterioles, and box-carring segmentation of the veins. Such arterial occlusions can be segmental or total. When total, there is usually an associated central red spot within the macula surrounded by the diffuse white retinal edema. In some instances there can be a central retinal artery occlusion with preservation of the central vision because of the presence of a cilioretinal artery supplying the macular region.

Retinal artery occlusions can be produced by the following causes: Arteriolar spasm, which is quite rare; fibrinous thrombus overlying a sclerotic plaque, usually situated within the lumen of the retinal artery within the lamina cribrosa of the optic nerve; emboli arising from the carotid artery; rarely, bacterial fibrinous embuli in subacute bacterial endocarditis; arteritis, most frequently associated with cranial arteritis (temporal arteritis); mechanical causes related to pressure on the globe at the time of ocular surgery or by the mask in general anesthesia; and rarely by severely elevated intraocular pressure with acute glaucoma.[1]

Central retinal artery occlusions occur most commonly in people with generalized vascular disease, including systemic hypertension, generalized arteriolosclerosis, and diabetes mellitus. It is imperative to rule out treatable underlying diseases such as temporal arteritis, localized carotid vascular disease with atheromatous emboli to the retina, auricular fibrillation as with rheumatic heart disease, and subacute bacterial endocarditis. Because of the possibility of the associated above diseases, a general medical evaluation is indicated.

The treatment of central retinal artery occlusion is usually unrewarding since the loss of vision is frequently permanent. If the clinical picture is that of diffuse retinal edema with a cherry-red spot in the macula, no treatment will result in significant improvement of the vision since most of these eyes are usually blind. Treatment consists of the following: Ocular massage, inhalation of five percent CO_2 and 95 percent O_2 as carbogen, paracentesis of the anterior

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chamber to produce hypotony, intravenous "Diamox"® or oral glycerin to maintain ocular hypotony, fibrinolytic agents in the form of thrombolysin and possibly in the future urokinase, anticoagulation initially with heparin and subsequently converting to "Coumadin,"® the use of corticosteroids when the diagnosis of temporal arteritis is suspected, and finally, the management of the underlying systemic disease.

Central retinal vein thrombosis is a more insidious process and is frequently not noted by the patient since his visual impairment does not come on abruptly. The clinical picture is that of papilledema, diffuse retinal hemorrhages throughout the four quadrants of the eye, marked venous engorgement, and retinal edema which always involves the macula if the occlusion blocks the central retinal vein or one of its temporal branches.

Retinal vein occlusion results from one of the following three mechanisms: Occlusion by external compression and secondary endothelial proliferation; occlusion by primary venous disease of degeneration or inflammation; or occlusion by stagnation thrombosis which occurs in leukemia and polycythemia.[2] Like retinal artery occlusion, retinal vein occlusions are most frequently associated with systemic diseases of diabetes, essential hypertension, and generalized arteriolosclerosis. However, the following underlying diseases must be excluded: Hypergammaglobulinemia, leukemia, polycythemia, Wegner's granulomatosis, and carotid insufficiency. In younger individuals with central retinal vein thrombosis, there is frequently an associated vasculitis of the retinal vein for which reason adrenal corticosteroid therapy is strongly indicated.

The treatment of central retinal vein thrombosis consists of fibrinolytic agents, including thrombolysin and possibly, in the future, urokinase. Anticoagulation is used in some instances and is particularly indicated in cases of marked venous engorgement without significant hemorrhages. This is accomplished with initial heparinization and then subsequent conversion to "Coumadin." In younger individuals in which an associated phlebitis is suspected, the use of corticosteroids should be entertained. In cases with dysproteinemia the treatment is different and consists of plasmapheresis, penicillamine, and chlorambucil.

The association of glaucoma with ocular vascular accidents is significant. Glaucoma is a predisposing cause for both central retinal artery and central retinal vein occlusions. In fact, it has been estimated that as many as fifty percent of the patients with retinal vein occlusions have an underlying glaucoma simplex. It is also noteworthy that glaucoma can result from both central retinal artery and central retinal vein occlusions. There have been documented case reports in which a patient had no evidence of glaucoma preceding occlusion of a central retinal artery following which the patient developed advanced glaucoma in the eye with the occlusion.[3] In regard to retinal vein thromboses, there is a condition called 90-day glaucoma which has its onset approximately three months following the central retinal vein thrombosis. This condition is related to proliferation of newformed vessels on the iris surface which blocks the anterior chamber angle and produces hemorrhage into the anterior chamber. The condition is called hemorrhagic glaucoma and ultimately causes a blind, painful eye necessitating enucleation in many cases. In regard to the latter condition, studies have indicated that anticoagulation following retinal vein thrombosis reduces the incidence of hemorrhagic glaucoma in the neighborhood of from 40 percent to about ten percent.[4] This in itself seems indication enough for anticoagulation of cases with a recently-documented central retinal vein thrombosis. A favorable prognostic sign in cases with central retinal vein thrombosis is the presence of a higher systolic arterial pressure than the

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venous pressure of the occluded retinal vein.

Zweng[1] has noted the following interesting observations on patients with ocular vascular accidents. There is a 12 percent incidence of bilaterality of ocular vascular accidents which was noted to occur either preceding the onset of the second eye or which occurred in the second eye during the time of observation. He has noted only one patient of 97 treated with anticoagulants who developed hemorrhagic glaucoma. Three percent of the patients in his series actually developed an ocular vascular accident while on anticoagulants.

The use of intravenous fluorescein angiography aids one in evaluating the presence of ocular vascular occlusions. These studies are particularly helpful with branch artery and vein occlusions where one can note late filling of the affected vessels with fluorescein and actual pooling of the dye in the stagnant vessels on delayed angiographic pictures. Furthermore, fluorescein angiography is useful in evaluating the effect of treatment with the fibrinolytic agents and with anticoagulants in noting whether the treatment has affected the patency of the previously-occluded vessel.

Special mention should be given to the subject of amaurosis fugax or so-called transient ischemic attacks. Walsh and Hoyt[5] have listed the following ten possible causes of transient ischemic attacks: Vasospasm, emboli, hypotension, glaucoma, mechanical with head turning, temporal arteritis, Raynaud's disease, increased intracranial pressure with papilledema, severe anemia, and migraine. They state that emboli from atheromatous plaques of the ipsilateral carotid artery account for by far the majority of cases of transient ischemic attacks. Fisher[6] in 1959 first reported the observation of an embolus passing through the retinal arterial tree in a patient with transient monocular blindness. Emboli from atheromatous plaques of the ipsilateral carotid artery are now well documented in the ophthalmological and neurological literature as a most common cause for amaurosis fugax.[7, 8, 9]

Marshall and Meadows[10] in 1968 performed a follow-up study on the natural history of patients with amaurosis fugax. In their series of 80 patients with amaurosis fugax, 20 percent had bruits over the ipsilateral carotid artery, 12 percent developed transient or permanent hemiperesis. Ten percent developed loss of vision and four percent had hemiplegia. Even more striking is the figure of 16 of the 27 patients on whom carotid angiography was performed showed a stenosed carotid artery. In this small sub-series of the 27 patients studied, there were, in fact, 55 percent with stenosed carotids. This figure is in marked contrast to the 17 percent incidence of carotid stanosis in an unselected series of cases with acute strokes performed by Bull, Marshall and Shaw.[11] In an earlier report, Marshall reported that 16 of 34 patients with transient ischemic attacks developed a major stroke within one month of their first attack. Furthermore, only one or two attacks occurred before major strokes in 75 percent of the cases. This would indicate that if one had had multiple ischemic attacks over a period of many months the prognosis might not be as grave. Acheson and Hutchinson[12] also had a follow-up on patients with transient cerebral ischemia. In their series of 82 patients followed for 40 months, 18 or 22 percent became disabled or died from stroke. One notes from the above studies that serious complications including stroke or blindness occur in 22 percent to 55 percent of cases with transient ischemic attacks.

In regard to therapy, fibrinolytic agents are probably not extremely helpful in this disease since the embolic atheromatous plaque plugging up the retinal artery will probably not be affected by the fibrinolytic agent. On the other hand, carotid angiography with subsequent carotid endarterectomy when indicated seems advisable in a large number of these cases. Ehrenfeld, Hoyt and Wylie[13] reported a follow-up on 44 patients with amaurosis fugax and proved carotid disease. Thirty-two of these patients underwent carotid endarterectomy without sequelae. Thirty remained asymptomatic entirely, whereas two showed no improvement following surgery. Of the remaining 12 patients that were not operated on, ten had stroke or subsequent blindness,

and the remaining two have had no serious sequelae.

Ischemic optic neuropathy deserves special comment. This is a syndrome in which there is a vascular occlusion involving the optic nerve itself, sparing the retinal vessels. The condition is usually manifested by sudden loss of vision with a clinical picture of an edematous pale optic nerve, occasionally associated with adjacent retinal hemorrhage.[14] If the occlusion is further posterior in the optic nerve, there may be no swelling of the nervehead. Rarely, this disease can have an insidious onset showing only optic pallor. The visual fields typically show an altitudinal visual field loss. The patients are usually 60 years of age or older even though the condition has been reported in the fifth decade of life. Ischemic optic neuropathy should always arouse suspicion of temporal arteritis necessitating sedimentation rate determination and temporal artery biopsy.[15, 16, 17, 18] When these are positive, corticosteroid therapy is mandatory in an attempt to prevent subsequent ischemic optic neuropathy in the second eye which if untreated can result in bilateral blindness.

The author had a 44-year-old diabetic female who presented at 4:00 a.m. with sudden loss of vision after a three-day-history of amaurosis fugax. Because of a pale, swollen optic nervehead, with adjacent hemorrhage, the diagnosis of ischemic optic neuritis was made. The sedimentation rate and temporal artery biopsies were both negative. It was felt that the cause for this patient's ischemic optic neuropathy was on the basis of diseased blood vessels supplying the optic nerve. She had a severe altitudinal scotoma with less than 20/400 vision which improved (after three days of retrobular steroids, intravenous fibrinolysin and oral prednisone given 80 mg. daily ultimately to 20/20 vision with persistence of an altitudinal scotoma. The patient was maintained on anticoagulation for six months.

In summary, ocular vascular accidents present a perplexing problem to the physician. They demand immediate ophthalmological attention, and when therapy is indicated it must be prompt to be effective. Underlying systemic diseases must be searched for and treated. □

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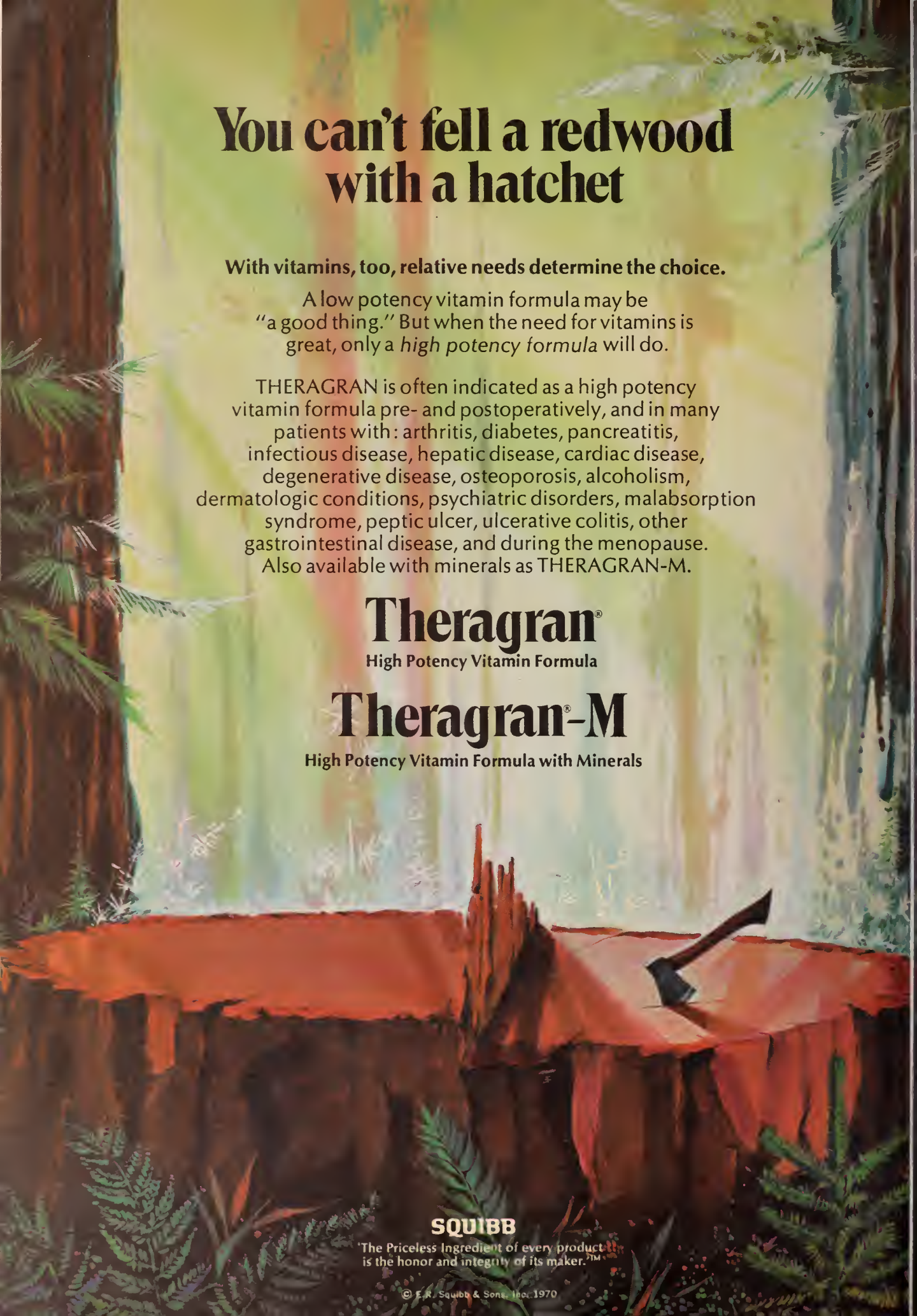
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Conduction Abnormalities in the Presence of Acute Myocardial Infarction

JAMES J. SNIPES, M.D.
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Temporary transvenous pacing for acute myocardial infarction with a heart rate below 50, not readily responsive to drugs, may prevent asystole, increase a low cardiac output and/or suppress ectopic beats.

SYNOPSIS ABSTRACT

FROM A SERIES of 259 monitored patients with acute myocardial infarctions, 64 developed an atrioventricular conduction abnormality or sinus arrest.

Mobitz I block was seen only in the group with inferior wall myocardial infarction, and Mobitz II, only in the group with anterior wall myocardial infarction. The latter progressed to ventricular asystole much more frequently than the former (nine percent compared to 100 percent). Third-degree A-V block progressed to ventricular asystole in 22 percent of patients with acute inferior wall myocardial infarction and in 67 percent of patients with acute anterior wall myocardial infarction. Therefore, second-degree or third-degree block in a patient with an acute anterior wall myocardial infarction represents a serious threat of ventricular asystole; and third-degree block in the presence of an acute inferior wall myocardial infarction represents a moderate risk for ventricular asystole.

The mortality from acute myocardial infarction associated with sinus arrest or atrioventricular conduction abnormalities varied significantly with the location of the infarction. In our series, the mortality was 32 percent in the presence of an acute anterior wall myocardial infarction and 13 percent in the presence of an inferior wall myocardial infarction.

Careful monitoring of patients with acute myocardial infarction has demonstrated the occurrence of arrhythmias in 90 to 95 percent of the cases.[1] The incidence of atrioventricular conduction abnormalities with acute myocardial infarction in several monitored series has been reported as: First-

From Saint John's Hospital, Tulsa, Oklahoma.

degree block occurring in twelve percent, second-degree block occurring in eight percent, and third-degree block occurring in seven percent. Mortality rates were 15 to 26 percent, 25 percent, and 44 percent respectively.[1, 2, 3, 4] These series have the disadvantage of not correlating the exact type of rhythm and infarct location with the mortality.

Occlusion of a coronary artery may seriously compromise the blood flow to pacing and/or conducting tissues in the heart. James has shown that the right coronary artery supplies the A-V node in 82 percent of cases, and the S-A node, in 52 percent of cases.[5] It is, therefore, to be expected that the frequency, but not necessarily the severity of conduction abnormalities associ-

Figure 1
ACUTE MYOCARDIAL INFARCTION—INFERIOR WALL

Case	Age	Block 1°	Block M I	Block M II	Block 3°	Asystole	Death	Comments
1	58-F	x	x		x(50)*			
2	57-M	x	x(40)					
3	49-F	x	x		x(55)*	x	x	Cardiogenic Shock
4	48-M	x	x(62)					
5	79-M	x	x(33)				x	Acute Infection, Previous A-S MI
6	61-M		x(56)		x			
7	69-M	x	x(52)					
8	53-M				x(56)*			
9	54-F		x(62)					
10	51-M				x(36)*			
11	48-M							Sinus Arrest
12	64-F				x(33)*		x	Vent. Fib.—Previous A-S MI
13	68-M		x(70)					
14	55-M	x	x		x			
15	70-M	x						
16	76-M	x						
17	44-M	x						
18	78-F	x						
19	57-M	x						
20	53-M	x						
21	51-F	x						
22	75-M	x						
23	73-F				x	x	x	Sinus mechanism; Morphine; 3rd degree block; Refractory Pulmonary Edema
24	33-M	x						
25	69-F	x						
26	66-M	x						
27	82-F	x						
28	54-M	x						
29	69-M	x						
30	81-M	x	x		x		x	Admitted - 3° - Paced; Cardiogenic shock
31	77-F	x						
32	52-M	x						
33	80-F	x						
34	72-F	x						
35	67-M	x						
36	57-M	x						Previous A-S MI
37	68-M	x						
38	64-M	x						
39	71-F	x						
40	79-F	x						
							13%	
TOTAL:		33	11	—0—	9	2		

*Slowest rate

ated with the occlusion of the right coronary artery, will be greater than those with occlusion of the left coronary artery. It must be kept in mind that edema of pacing or conducting tissues without infarction can also cause transient arrhythmias. Atrioventricular block may result from interruption of conduction in the A-V junctional tissue or in both bundles simultaneously. It is recognized that the patient with anterior wall myocardial infarction who develops an atrioventricular conduction abnormality is in danger of a fatal arrhythmia and/or cardiac failure. This is because of the marked loss of myocardium, which is necessary to extend far enough posteriorly to involve the posteriorly located conducting tissue. The bundles are also frequently involved by the anterior wall infarction.

Between August 1, 1967, and July 31, 1969, 259 patients with a confirmed diagnosis of acute myocardial infarction have been monitored in the Intensive Coronary Care Unit at St. John's Hospital in Tulsa, Oklahoma. Sixty-four cases (24 percent) developed an atrioventricular conduction defect or sinus arrest (one case), 34 percent occurred in patients with anterior wall myocardial infarction, and 62 percent occurred in patients with inferior wall infarction, and four percent in patients with a periapical myocardial infarction. The analysis of these 64 cases, noting the degree of atrioventricular block, progression of the degree of block, and the mortality rate, comprise our report. The diagnosis of acute myocardial infarction was based on the history, physical examination, electrocardiogram, and enzyme abnormalities. Our criteria for atrioventricular conduction defects were:

A. First-degree block—the P-R interval exceeds 0.2 seconds.
B. Second-degree block
   1. Mobitz I — typical Wenckebach Phenomenon.
   2. Mobitz II—constant P-R interval with intermittently blocked A-V

Figure 2

ACUTE MYOCARDIAL INFARCTION—ANTERIOR WALL

Case	Age	Block 1°	Block M I	Block M II	Block 3°	Asystole	Death	Comments
1	57-F			x(64)		x	x	Cardiogenic Shock
2	84-M				x(52)	x	x	Intractable Cardiac Failure; Pulmonary Edema
3	50-M	x		x	x(66)	x		
4	67-F	x		x		x	x	Ruptured Vent., Previous MI
5	83-F			x		x	x	Pulmonary Edema and Shock
6	79-F				x(74)		x	Vent. Fib.; Previous MI
7	79-M	x						
8	81-M	x						
9	67-M	x						
10	77-M	x						
11	60-M	x						
12	54-M	x						
13	67-F	x						
14	57-F	x						
15	66-M	x						
16	86-F	x						
17	75-M	x				x	x	Demerol; 1° block; G.I. Bleeding, Pneumonia; Cardiogenic Shock
18	62-M	x						
19	51-M	x						
20	74-M	x						
21	90-M	x						
22	84-M	x					x	Intractable Cardiac Failure; Pulmonary Edema
							32%	
TOTAL		13	—0—	4	3	6		

conduction (may result from bilateral bundle branch block).

C. Third-degree block—complete A-V dissociation.

D. Ventricular asystole—no ventricular contractions in a period of six seconds.

The cases reviewed were divided according to the types of myocardial infarctions present. There were 40 patients with an acute inferior wall myocardial infarction present (Figure 1), 22 patients with an acute anterior wall myocardial infarction (Figure 2), and two patients with massive infarction involving the periapical region (Figure 3), who developed first-degree block, second-degree block, third-degree block, ventricular asystole, or sinus arrest. These comprise the series studied.

RESULTS

(*Figure 4*) Of the 40 patients with an acute inferior wall myocardial infarction and conduction abnormality in our study, 83 percent developed first-degree block, 28 percent developed Mobitz I block, none developed Mobitz II block, 23 percent developed third-degree block, five percent (two patients) developed ventricular asystole, both of whom were in cardiogenic shock, and 2.5 percent (one patient) developed sinus arrest. In this group with inferior wall myocardial infarction, five deaths occurred: Two in cardiogenic shock, one in refractory pulmonary edema, one in ventricular fibrillation, and one with overwhelming infection.

In the group of 22 patients with acute anterior wall myocardial infarction with conduction defects, 82 percent developed first-degree block, none developed Mobitz I block, 18 percent developed Mobitz II block, 14 percent developed third-degree block, and 27 percent developed ventricular asystole. Seven deaths occurred in this group, three in cardiogenic shock, one with a ruptured ventricle, one with ventricular fibrillation, and two with intractable cardiac failure and pulmonary edema.

Figure 4

INCIDENCE OF ATRIOVENTRICULAR CONDUCTION ABNORMALITIES IN THE PRESENCE OF ACUTE MYOCARDIAL INFARCTION

Block	Inferior	Anterior
1°	40 Patients 83%	22 Patients 82%
2°		
Mobitz I	28%	0%
Mobitz II	0%	18%
3°	23%	14%
Asystole	5%	27%

(*Figure 5*) This compares the progression in degree of atrioventricular conduction abnormalities in the presence of acute inferior wall and acute anterior wall myocardial infarctions.

Of the group of 33 patients with acute inferior wall myocardial infarction and first-degree A-V block, nine percent progressed to Mobitz I block, none progressed to Mobitz II block, 15 percent progressed to third-degree block, and three percent progressed to ventricular asystole.

In the group of 18 patients with acute anterior wall myocardial infarction and first-degree A-V block, none progressed to Mobitz I block, 11 percent progressed to Mobitz II block, six percent progressed to third-degree block, and 17 percent developed ventricular asystole.

Of those patients with acute inferior wall

Figure 3

ACUTE MYOCARDIAL INFARCTION—PERIAPICAL

Case	Age	Block 1°	M I	M II	3°	Asystole	Death	Comments
1	81-M	x					x	Repeated Vent. Fib.; Cardiac Failure; sudden death
2	63-F	x	x	x		x	x	Intractable Cardiac Failure; Pulmonary Edema; Hydrothorax
TOTAL:		2	1	1	—0—	1	2	

Figure 5
PROGRESSION IN DEGREE OF ATRIOVENTRICULAR CONDUCTION ABNORMALITY IN THE PRESENCE OF ACUTE MYOCARDIAL INFARCTION

Degree of Block	Location of Myocardial Infarction Inferior	Anterior
I. First Degree to:	33 Patients	18 Patients
A. Mobitz I	9%	0%
B. Mobitz II	0%	11%
C. Third Degree	15%	6%
D. Ventricular Asystole	3%	17%
II. Second Degree		
A. Mobitz I to:	11 Patients	0 Patients
1. Mobitz II	0%	0%
2. Third Degree	45%	0%
3. Ventricular Asystole	9%	0%
B. Mobitz II to:	0 Patients	4 Patients
1. Third Degree	0%	25%
2. Ventricular Asystole	0%	100%
III. Third Degree to:	9 Patients	3 Patients
A. Ventricular Asystole	22%	67%

myocardial infarction and Mobitz I second-degree block, none progressed to Mobitz II block, 45 percent progressed to third-degree block, and nine percent developed ventricular asystole. There were no patients in this group with Mobitz II block.

There were no patients with acute anterior wall myocardial infarctions and Mobitz I block. Four patients in our series were found to have an anterior wall myocardial infarction and Mobitz II block. Of these, 25 percent progressed to third-degree

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Figure 6
MORTALITY RATE OF PATIENTS WITH ATRIOVENTRICULAR CONDUCTION DEFECTS FOLLOWING ACUTE MYOCARDIAL INFARCTION

Degree of Block	Inferior	Anterior
1°	4/33 (12%)	3/18 (16%)
2°		
Mobitz I	3/11 (27%)	0/0 (0%)
Mobitz II	0/0 (0%)	3/4 (75%)
3°	4/9 (44%)	2/3 (66%)
Ventricular Asystole	2/2 (100%)	5/6 (83%)
TOTAL:	5/40 (13%)	7/22 (32%)

block and 100 percent developed ventricular asystole.

Of nine patients with acute inferior wall myocardial infarction and third-degree block, 22 percent developed ventricular asystole. Of the patients with acute anterior wall myocardial infarction and third-degree block, 67 percent proceeded to ventricular asystole.

The atrioventricular conduction abnormalities seen with acute inferior wall myocardial infarctions were often transient and frequently responded to atropine alone. No patient who survived developed a permanent third-degree block.

(*Figure 6*) In the group of patients with acute inferior wall myocardial infarction, the mortality was 12 percent for those with first-degree block and 27 percent for those with Mobitz I block. There were no patients in this group with a Mobitz II block. The mortality was 44 percent for those patients with third-degree block and 100 percent for those with ventricular asystole. The overall mortality for patients with acute inferior wall myocardial infarction and an atrioventricular conduction defect or sinus arrest was 13 percent.

In the group of patients with acute anterior wall myocardial infarction, the mortality was 16 percent for those with first-degree block. There were no patients in this group with Mobitz I block; however, the mortality was 75 percent for those patients with Mobitz II block. Sixty-six percent of the patients in this group with third-degree block and 83 percent of those with ventricular asystole died. The overall mortality for patients with acute anterior wall myocardial infarction and an atrioventricular

Figure 7

INDICATIONS FOR A PACEMAKER IN THE PRESENCE OF AN ACUTE MYOCARDIAL INFARCTION

A. Prevent asystole
B. Increase a low cardiac output by increasing resting heart rate
C. Suppress escape of repetitive subsidiary ectopic beats

	Indications for Pacemaker	Medical Management
1. Complete A-V block with a ventricular rate below 50 per minute	A*, B, and occasionally C	Isoproterenol and/or Atropine for acute management only
2. Incomplete A-V disassociation; Mobitz Type II block	A*, occasionally B and C	"
3. Sinus arrest	A*	"
4. Sinus bradycardia with a rate below 50 per minute	B, C (atrial pacing)	Try before pacing (for B)
5. Incomplete A-V disassociation; Mobitz Type I block (Wenckebach Phenomenon) with a ventricular rate below 50 per minute	B, occasionally C	"

*Indication for immediate insertion of a pacing catheter

The probability of asystole occurring is increased when an A-V conduction abnormality is seen in conjunction with an anteroseptal infarction, particularly when associated with bilateral bundle branch block.

conduction abnormality was 32 percent. The overall mortality for the group of 259 patients with a confirmed diagnosis of acute myocardial infarction was 26 percent. The mortality of the group with acute periapical infarction was 100 percent; however, there were only two patients in this group.

DISCUSSION

In this series, the Mobitz I block was confined to the group with acute inferior wall myocardial infarction, while the Mobitz II block occurred only in the group with acute anterior wall myocardial infarction. It has generally been agreed that the Mobitz I block is seen when the atrioventricular conduction abnormality occurs in the A-V conducting tissue above the bifurcation of the bundle of His; whereas, the Mobitz II block occurs when the block is present within the left and right bundles. The former region is affected by ischemia and/or edema primarily in the presence of an acute inferior wall myocardial infarction; whereas the latter, primarily in the presence of an acute anterior wall myocardial infarction involving the septum. The Mobitz I block progressed much less frequently to ventricular asystole than did the Mobitz II block in our series, supporting the previously held thesis. The subsidiary pacemaker is higher in the presence of a Mobitz I than with the Mobitz II block, perhaps accounting for its being a more reliable pacing site. The mortality of patients with acute anterior wall myocardial infarction and Mobitz II block was considerably higher than the group with acute inferior wall myocardial infarction and Mobitz I. This may be related to the instability of the pacemaker with Mobitz II as well as to the fact that a greater amount of myocardium has been lost with the anterior wall infarction and block, as noted previously. It was also noted that the mortality of third-degree heart block was higher in the anterior than inferior wall myocardial infarction group, perhaps for the same reason.

It should be appreciated that the patients with acute myocardial infarction who developed a severe A-V conduction defect, ventricular asystole, and death had severe disease with contributing complications. It has

been observed by others that associated evidence of severe myocardial damage, such as shock, adds significantly to the mortality seen with heart block.[6, 7]

The beneficial effect of inserting a transvenous pacemaker in a given patient is often dramatic; however, it is difficult to demonstrate its effect in a series because of the frequent association with complicating events. When a slow or unreliable ventricular rate is detrimental to the patient because of (a) the possibility of ventricular asystole occurring, (b) a low cardiac output, or (c) the occurrence of repetitive subsidiary ectopic beats, a pacemaker appears to be indicated. Figure 7 outlines our indications for a temporary transvenous pacemaker.

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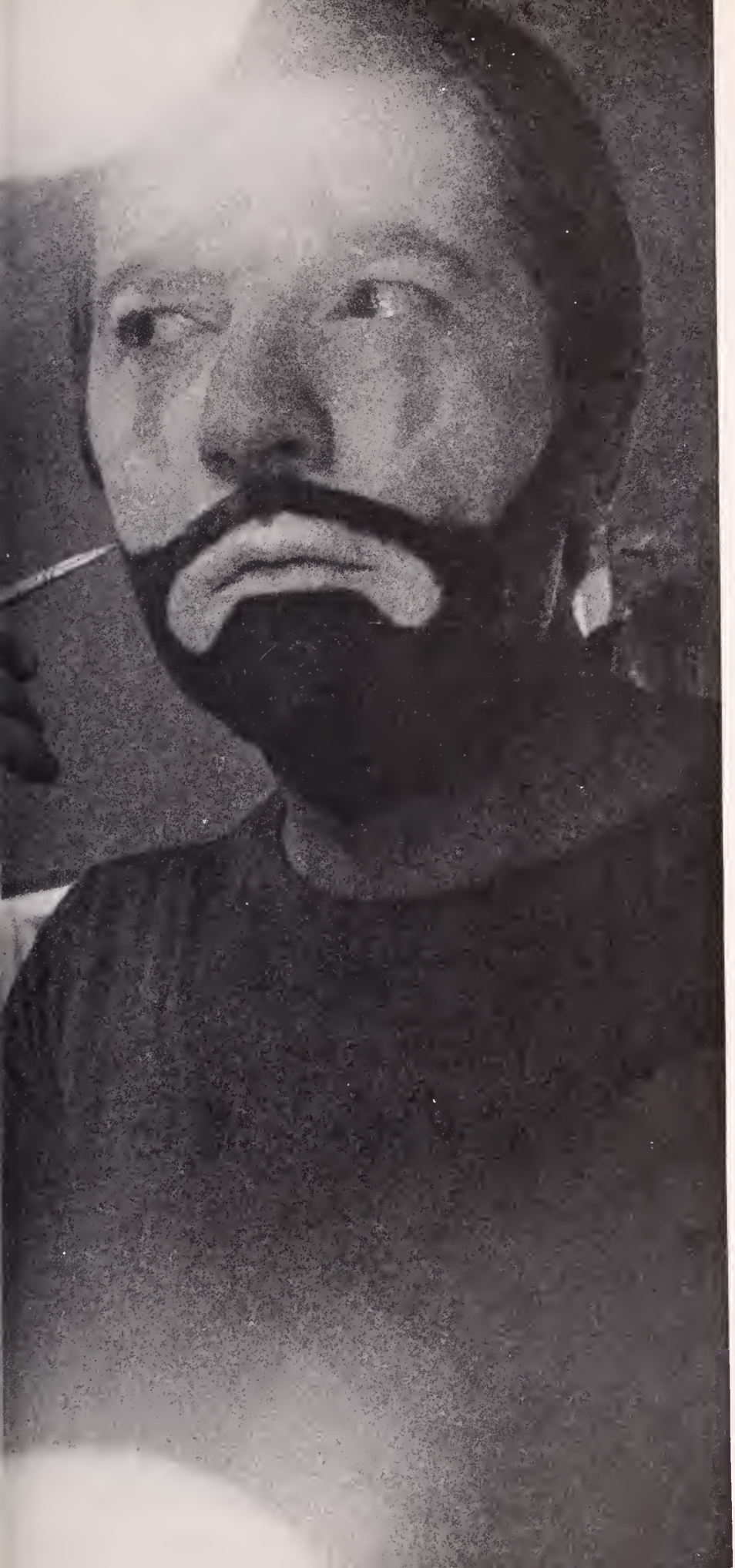
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Management of Urinary Tract Injuries Following Surgery

VINCENT J. O'CONOR, Jr., M.D.

Injury of bladder and ureters can occur after gynecologic or general surgery procedures. Techniques of diagnosis and treatment of these are discussed.

THE EXACT INCIDENCE of injury to the lower urinary tract following surgery is unknown: Many injuries to the bladder and ureter are unreported as they are usually recognized immediately and repaired promptly. Nevertheless, fistulas from either the ureter or bladder to the vagina continue to develop; a distressing problem for the operating surgeon. Many injuries to the ureter remain unrecognized as the kidney often ceases function and quietly atrophies without producing symptoms. Recent reviews suggest that obvious ureteral injury occurs in appromixately 2.5 percent of patients undergoing hysterectomy for benign conditions and in eight to 30 percent of patients having radical procedures for uterine malignancy. Postoperative radioisotope renograms performed in our institution showed some degree of ureteral impairment in 46 percent of patients undergoing gynecologic operations. Since injury to the urinary tract occurs even in the best of hands and is most easily handled when immediately recognized, the principles of early recognition and definitive correction should be familiar to everyone undertaking pelvic surgery. This discussion will be limited to injuries of the urinary bladder and ureter.

From the Department of Urology, Chicago Wesley Memorial Hospital and Northwestern University Medical Center, Chicago, Illinois 60611. Presented at the Oklahoma City Clinical Society Fall Conference, October 26th-28th, 1970.

BLADDER INJURIES

A. *Prevention*

Routine catheterization of the bladder seems worthwhile for obstetric delivery; however, when operating in the pelvis the recognition of bladder injury often depends upon a gush of fluid from this structure after puncture. We believe the bladder should *not* be emptied before abdominal or pelvic surgery and if catheterization is necessary to perform a preliminary pelvic examination, the bladder should be filled with several ounces of sterile saline prior to the surgical procedure.

B. *Recognition and Management*

I. During Vaginal Procedures

The presence of urine in the operative field indicates injury to the urinary tract. If the source is not readily apparent a colored solution such as methylene blue or indigo carmine can be instilled into the bladder to delineate the area of injury. If the solution does not appear and leakage of

urine continues, ureteral injury is suspected and further search must be made for the exact site of the injury.

When the area of the bladder injury is exposed immediate repair should be undertaken to develop watertight closure of the bladder wall. Our preference is for a first layer of continuous 3-0 plain catgut since placing a submucosal layer without perforating the mucosa is difficult and calculi frequently form on chromic catgut as they invariably do with silk or cotton. The muscularis and serosa are then closed with interrupted 2-0 chromic catgut. A #18 Foley catheter is left indwelling and the bladder is irrigated to detect any remaining leak. If the bladder defect is extensive or if a segment of bladder has been inadvertently excised a suprapubic cystostomy may be performed with proper drainage of the prevesical space.

Postoperative urethral catheter drainage is continued for seven to ten days depending upon the extent of the injury. We do not routinely irrigate these catheters unless they become plugged or bleeding becomes troublesome. Either a sulfonamide or methanamine mandelate is given during the period of catheter drainage. A urine culture is obtained before removing the catheter and when sensitivities are determined, specific medication is then given to eradicate any residual infection.

II. During Abdominal Procedures

Injuries to the bladder during abdominal procedures usually occur during mobilization of the peritoneum from the anterior bladder wall or at the base of the bladder while freeing or removing the cervix. If the bladder defect is promptly recognized the usual three layer closure is effected with Foley catheter drainage as described. If the defect is extensive, suprapubic drainage is instituted with appropriate split rubber or penrose drains being led out extraperitoneally to drain the prevesical space, after definitive reperitonealization of the floor. These drains are generally removed in 48 hours. Several points regarding cystotomy are worth emphasizing. The tube should be placed high at the dome of the bladder so that the mushroom or the Foley bag is held snugly at the roof to avoid postoperative trigonal irritation and so-called "bladder spasm." The superior exit of the tube avoids contact with the symphysis and prevents the peritoneum from becoming adherent in the prevesical space. Fixation which results from an unusually low suprapubic cystostomy makes subsequent bladder surgery more difficult. When a cystotomy is used the tube can usually be removed on the fifth to seventh postoperative day, and a urethral catheter inserted which is removed 48 hours later.

C. Recognition in the Early Postoperative Period

Small perforations of the bladder may close spontaneously or, if the opening is extraperitoneal, may wall off without difficulty. Unless the patient develops hematuria, the defect may be unnoticed. If hematuria develops, some damage to the bladder wall has usually occurred and an indwelling catheter should be inserted and left in for at least seven days. If there is evidence of urine extravasation such as marked tenderness or rebound or muscle spasm, a cystogram should be made after insertion of the Foley catheter. When obvious extravasation is present, immediate exploration is advised with closure of the defect and drainage of the prevesical space. Many of the late complications of bladder injury result from small tears which partially close in the immediate postoperative period only to develop into fistulas two or three weeks following surgery.

D. Late Complications

The most ominous complication of unrecognized bladder injury is the development of a vesico-vaginal fistula. This usually becomes evident two to three weeks after surgery and is heralded by the sudden development of total urinary incontinence. The first step in treatment is the insertion of an indwelling catheter with instillation of a colored solution which will appear in the vagina. Excretory urography should be carried out since many patients with vesico-vaginal fistulas also have uretero-vaginal fistulas which must be recognized before surgical correction is considered. Cystoscopic examination is then carried out since more than one fistula may be present and all openings should be delineated before re-

pair is contemplated.

Some vesico-vaginal fistulas will close spontaneously with proper catheter drainage. Endoscopic and vaginal electrocoagulation of the fistulous tract often aids healing of these small fistulas and may be carried out at the time of initial cystoscopic examination. We generally continue urethral catheter drainage for several weeks to one month.

If the defect does not respond to these simple methods of treatment ultimate surgical closure is necessary. Since the early repair of vesico-vaginal fistula is often defied by the initial inflammatory process which prevents proper tissue healing, these repairs should be postponed for at least three to six months. This is an extremely difficult period of time for the surgeon in caring for a patient who is continually wet; however the ultimate good result is often dependent upon such a period of waiting.

Small low lying fistulas can be best approached by the vaginal route with excision of the tract and double layer closure of the bladder and vagina attempting to interpose some normal tissue between the suture lines. Either an indwelling catheter or suprapubic cystostomy is maintained for three weeks postoperatively.

Large defects on the floor of the bladder and those which have been unsuccessfully closed by the vaginal approach are best handled using a suprapubic approach. This method involves bisection of the posterior bladder wall with a tennis racket excision of the fistula and primary closure with adequate suprapubic and urethral catheter drainage for at least three weeks. A cure is expected and has been effected in over 95 percent of the last 70 patients subjected to this type of closure.

URETERAL INJURIES

A. *Prevention of Ureteral Injuries*

Damage to the ureter is best avoided by maintaining a continuous conscious awareness of the presence of the ureter throughout any operative procedure in the lower abdomen or pelvis. Preoperative pyelography is not imperative in all patients undergoing pelvic surgery; however, in those patients with large fibroids, uterine malignancy or endometriosis, preoperative urography often may be helpful. The passing of ureteral catheters before surgery is not necessary for most procedures and in no way prevents ureteral injury since the small catheter may be difficult to palpate in the ureter. If such a catheter is placed it should be of large caliber, either six or seven French. The most valuable method for avoiding injury to the ureter is adequate exposure and continued visualization of the structure during the operative procedure. Most ureteral injuries occur when bleeding is troublesome and result from indiscriminate or blind clamping of the bleeding vessels.

B. *Management of Ureteral Injuries*

I. During Surgery

Ureteral injuries include temporary clamping with a hemostat, partial angulation by a suture, complete transection of the ureter or even excision of a segment of the ureter. If a clamp has been inadvertently placed on the ureter and is promptly recognized it may often be removed with no subsequent difficulty. If the ureter appears viable and has good peristalsis it can be merely splinted by a ureteral catheter placed endoscopically before closing the abdomen. As a rule such a splint is left in place for five to seven days and fixed to an indwelling Foley catheter. If the tissue does not appear healthy or viability is questionable, the splinting catheter is left in for several weeks, by which time longitudinal healing is complete.

Complete transection of the ureter should

Vincent J. O'Conor, Jr., M.D., was graduated from the Northwestern University Medical School in 1953, where he is presently Professor of Urology. Certified by the American Board of Urology, Doctor O'Conor is a member of the American College of Surgeons, the Pan-Pacific Surgical Association, the American Urological Association, the International Society of Urological Endocrinosurgery, the Society of Pelvic Surgeons and the American Association of Genito-Urinary Surgeons.

be repaired primarily but not necessarily immediately. When such injury becomes evident the primary operative procedure should be completed before direct attack upon the ureter is contemplated. The preferable method is end to end anastomosis spatulating the opposite ends of the ureter to produce an elliptical anastomosis which results in increased circumference at this point and decreases the tendency to subsequent stricture formation. We use interrupted sutures of 4-0 catgut and try to effect a watertight closure. A splint may be used if there appears to be tension on the anastomotic site; however, this can be avoided by doing a proximal ureterotomy and carrying a drain out from this area.

If the distal segment of the ureter has been excised or cannot be identified, reimplantation of the ureter is preferable. This is done similar to a Leadbetter-Politano antireflux procedure where the ureter is brought obliquely through the bladder muscle and a tunnel is made for approximately four cm before doing a mucosal anastomosis with four or five 4-0 catgut sutures. When adequate length does not seem to be available the bladder may be fixed laterally to the iliac muscles bridging a considerable gap, allowing for a tension free anastomosis. Again, a splint may or may not be used according to the condition of the ureter and the appearance of the anastomotic procedure.

If the ureter cannot be reimplanted without tension, a Boari bladder flap may be turned upward from the wall of the bladder and the ureter reimplanted into this tube which may measure from seven to eight cm. When this is done a splinting ureteral catheter is generally left indwelling for ten to 14 days. All of these procedures involve standard urological techniques and most practicing urologists utilize them frequently. For this reason it is often wise to have the advice or assistance of a urologic surgeon when such complications develop.

II. Recognition in the Early Postoperative Period

Anuria following pelvic surgery is quite suggestive of bilateral ureteral obstruction. The most helpful diagnostic test is a radioisotope renogram which will show a characteristic tracing of ureteral obstruction differentiating this condition from acute tubular necrosis. If an obstructive pattern is evident on the renogram, cystoscopic examination should be carried out with an attempt at passing ureteral catheters. Occasionally the major problem is merely edema and if catheters can be passed this may be a curative procedure. If catheters do not pass and an adequate period of time has elapsed for rehydration and the cessation of edema, reexploration should be carried out. Nephrostomy has been suggested often in the past; however, a direct approach to the primary problem seems more justified.

Ureteral injury is often manifested by flank pain and a persistent fever. When this occurs following pelvic surgery, excretory urography should be performed immediately and if obstruction is present, an attempt at ureteral catheterization carried out. Again, the mere presence of a ureteral catheter may serve to allow adequate healing. If transection has occurred or if a uretero-vaginal fistula becomes evident, ureteral catheterization should be attempted again and if the catheter will pass beyond the area of leakage, it should be left in place for two weeks and a pyelogram made prior to removal. Many uretero-vaginal fistulas will close spontaneously by proper splinting with a ureteral catheter.

When uretero-vaginal fistula is present and a catheter will not pass the point of obstruction, surgical re-exploration with reimplantation of the ureter should be carried out if the patient's condition is satisfactory. If the patient is severely ill or sepsis is present, a nephrostomy may be indicated during the period of initial healing and the secondary operation can be delayed until the patient's condition improves.

III. Late Recognition of Ureteral Damage

When partially or completed obstructed ureter is found in late convalescence a difficult decision presents. It is uncertain how long a ureter may be completely obstructed before renal function permanently ceases but somewhere between three or four weeks seems to be the critical period. In this situation one can well consider temporary nephrostomy to allow more complete evaluation of renal function. If adequate renal

function does not return, nephrectomy must be considered. The development of a uretero-vaginal fistula late after pelvic surgery affords a better prognosis in terms of unilateral renal function; however, again, re-exploration with reimplantation of the ureter should be carried out at the earliest opportunity. A procedure which is of value when an extensive segment of ureter has been damaged is the anastomosis of the involved ureter to the contralateral normal ureter, a so-called transureteral ureterostomy. Results with this procedure are most gratifying and it is technically easier to perform than a replacement of the segment with portions of small intestine. Occasionally if the initial operation was done for carcinoma and the prognosis poor it may be most judicious to perform nephrectomy, assuming the contralateral kidney function is proved adequate. □

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TULSA 71

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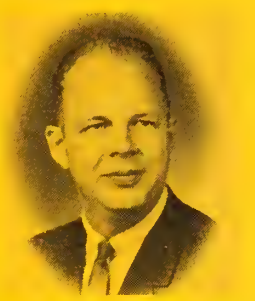
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REGISTRATION

General registration will be located on the third floor of the Tulsa Assembly Center. Hours will be from 8:00 a.m. until 5:00 p.m. on Thursday, Friday and Saturday, April 29th-May 1st.

Members of the House of Delegates (including the Board of Trustees and Officers) may register from 9:00 a.m. until 5:00 p.m. at the General Registration Desk, Tulsa Assembly Center. At 6:00 p.m. on Thursday, prior to the opening session of the House, registration will be moved to the Pompeian Court, Fairmont-Mayo Hotel. Registration for the House of Delegates will continue on Friday and Saturday mornings at 9:00 a.m. at the Tulsa Assembly Center.

The presentation of Delegates' credentials cards will be necessary to receive special badges and portfolios containing the business items to be considered.

BOARD OF TRUSTEES

The OSMA Board of Trustees will conduct its annual business meeting Thursday morning at 9:00 a.m. in the Emerald Room of the Fairmont-Mayo Hotel.

HOUSE OF DELEGATES

The OSMA House of Delegates will conduct two sessions during the 1971 annual meeting.

The opening session will be held at 7:00 p.m. on Thursday, April 29th, in the Pompeian Court, Fairmont-Mayo, and the closing session will be on the fourth floor of the Tulsa Assembly Center beginning at 9:00 a.m., Saturday, May 1st.

The opening session will feature the appearances of special guests, introduction of reports and resolutions, nominations of OSMA general officers, AMA delegate and candidates for the Board of Trustees.

All items of business introduced during the opening session will be referred to Reference Committees which will meet at 9:00 a.m. on Friday in meeting rooms situated on the third and fourth floors of the Tulsa Assembly Center. Open hearings on the reports and resolutions will be conducted by the four committees, providing all OSMA members with an opportunity to present their views.

The Reference Committees will prepare reports containing recommendations for presentation to the House of Delegates at the Saturday morning closing session. Elections will also be held during the closing session.

SCIENTIFIC SESSIONS

The scientific and educational portion of the annual meeting will be held in the Tulsa Assembly Center on Thursday afternoon and all day on Friday and Saturday.

A complete program appears in this issue of *The Journal*.

FREE PICNIC LUNCHEONS

The proverbial free lunch will be offered to all physicians and exhibitors on Friday and Saturday when Oklahoma Blue Shield and the Insurance Company of North America will host picnic-type spreads.

Corned beef and pastrami sandwiches, beer, soft drinks, assorted relishes and side dishes will be served in an informal atmosphere. The Friday event will be located on the stage in the exhibit area and the Saturday luncheon will be in the foyer near the General Registration Desk.

WINE TASTING PARTY

Friday night's social event will be the always-popular California Wine Tasting

Party co-sponsored by the OSMA and the California Wine Growers Association. A variety of outstanding California wines will be introduced to physicians and their wives by a professional wine taster. The event will be in the Fairmont-Mayo's Crystal Ballroom at 6:00 p.m.

APPEARANCE OF AL CAPP

A highlight of the programming will be a 2:30 p.m. Saturday appearance of famed cartoonist-lecturer Al Capp in the Tulsa Assembly Center. The satirical humorist will speak from a question and answer format under the label "Ask Al Capp."

PRESIDENT'S INAUGURAL DINNER-DANCE

On Saturday night, May 1st, the Annual President's Inaugural Dinner-Dance will be held at 7:00 p.m. in the Crystal Ballroom of the Fairmont-Mayo, preceded by a 6:00 p.m. social hour in the hotel's Pompeian Court.

Lucien M. Pascucci, M.D., Tulsa, will succeed Ed L. Calhoon, M.D., Beaver, as President of the Oklahoma State Medical Association. The inaugural ceremony will follow the banquet and entertainment.

Featured entertainment for the evening will be the internationally-known World Action Singers of Tulsa's Oral Roberts University.

The banquet menu will include steak complimented by red wine. During the dance — played by the popular Sammy Pagna Orchestra—setups may be obtained from the hotel.

Social hour, dinner with wine, inaugural ceremony, dancing and entertainment—a delightful evening all for the below-cost price of $10.00. Order your tickets in advance from the OSMA, 601 N.W. Expressway, Oklahoma City 73118.

GOLF AND TENNIS TOURNAMENTS

The annual OSMA Golf Tournament will be held at the beautiful new Cedar Ridge Country Club at Broken Arrow. Contestants may tee off anytime on Friday, April 30th, except between the hours of 11:00 a.m. and 1:00 p.m. (restricted for club members). Greens fee is $5.00, payable at the club house. Pull carts are not permitted, but electric carts may be rented. Trophies will be provided by the OSMA.

Tennis players will compete for OSMA trophies at the Oral Roberts University outdoor courts on Friday, April 30th, beginning at 9:00 a.m. Two tournaments in singles and doubles will be conducted, with age 50 being the dividing line for the age groups. There will be no entry fee, balls will be furnished by players or purchased at the courts. Playoffs will be completed by noon on Saturday. Entries should be sent in advance to Hugh Perry, Jr., M.D., 6465 South Yale, Tulsa 74136.

PAST-PRESIDENTS' BREAKFAST

The traditional breakfast for Past-Presidents of the Oklahoma State Medical Association will be held at 7:30 a.m., Saturday, in Room A. Fairmont-Mayo Hotel.

EXHIBITS

Primary financial support for the annual meeting will be provided by fifty technical exhibitors (see roster on page 166). The exhibit area, which will also feature scientific and institutional displays, will be on the third floor of the Tulsa Assembly Center. Viewing hours will be 9:00 a.m. until 5:00 p.m. on Thursday, Friday and Saturday.

PRIZES

Physicians who visit the exhibits will be eligible to receive valuable prizes at a drawing to be held during the Saturday night Inaugural Dinner-Dance. A Sony TV and three fishing rods custom made by Joe Farthing will be offered, and two of the rods will come equipped with Ambassador reels. Provision will be made for physicians to register at each exhibit booth, and the more booths visited the better the odds of winning. □

PROGRAM

All Events Will Be in the Tulsa Assembly Center Unless Otherwise Noted

Thursday Morning, April 29th

9:00 a.m. **BOARD OF TRUSTEES MEETING** The annual meeting of the Board of Trustees will be held in the Emerald Room of the **Fairmont-Mayo Hotel.**

Thursday Afternoon, April 29th

2:00 p.m. **"LUMPS IN THE NECK—INCLUDING THYROID DISEASES"**—John Gaisford, M.D., Pittsburgh, Pennsylvania. Panel—Joe L. Spann, M.D. and Michael H. Berkey, M.D. Doctor Spann presiding. **Room A.**

Thursday Evening, April 29th

7:00 p.m. **HOUSE OF DELEGATES MEETING** The opening session of the House of Delegates will be held in the Pompeian Court of the **Fairmount-Mayo Hotel.**

Friday Morning, April 30th

9:00 a.m. **"GASTROENTEROLOGY WITH SPECIAL EMPHASIS ON CHANGING CONCEPTS OF HEPATITIS"** Leslie J. Schonfield, M.D., Los Angeles, California. Panel—David W. Jenkins, M.D. and Dale E. Van Wormer, M.D. Doctor Jenkins presiding. **Room A.**

9:00 a.m. **HOUSE OF DELEGATES REFERENCE COMMITTEE MEETINGS** Four House of Delegates Reference Committees will hold open hearings on all business items in meeting rooms located on the third and fourth floors of the **Tulsa Assembly Center, Rooms C, E, H, J.**

9:00 a.m. **OSMA ANNUAL GOLF TOURNAMENT** The tournament will be held at the beautiful new Cedar Ridge Country Club at Broken Arrow. Tee off at 9:00 a.m. (tee off is restricted to club members between 11:00 a.m. and 1:00 p.m.). Trophies will be provided by the OSMA. Greens fee is $5.00.

9:00 a.m. **OSMA ANNUAL TENNIS TOURNAMENT** The tournament will be held at the Oral Roberts University outdoor courts. Men's singles and doubles will be played in two divisions, one for physicians over age 50. Playoffs will be completed on Saturday morning. Entries should be made with Hugh Perry, Jr., M.D., 6465 S. Yale, Tulsa 74136. Trophies to be provided by OSMA.

11:00 a.m. "WOUNDS AND ILLNESSES THAT MAY HAVE CHANGED THE COURSE OF THE CIVIL WAR"—R. Maurice Hood, M.D., Austin, Texas. Ed L. Calhoon, M.D., presiding. **Room A.**

Friday Afternoon, April 30th

12:00 p.m. **FREE PICNIC LUNCHEON** Pastrami and corned beef sandwiches, assorted side dishes and relishes, plus beer and soft drinks, will be served on the stage in the exhibit area, third floor of the Tulsa Assembly Center. **Sponsored by Oklahoma Blue Shield.**

2:00 p.m. "DIABETES SYMPOSIUM"—Marvin E. Levin, M.D., St. Louis, Missouri. Panel—Robert L. Scott, M.D. and Robert K. Endres, M.D. Doctor Scott presiding. **Room A.**

3:00 p.m. "SYMPOSIUM ON CANCER OF THE HEAD AND NECK"
Cancer of the Antrum—A. Munson Fuller, M.D.
Radical Dissection in Cancer of the Neck—Rollie E. Rhodes, M.D.
Cancer of the Tongue—Willard B. Moran, Jr., M.D.
Cancer of the Tonsils—C. Lawrence Neal, M.D.
David O. Merifield, M.D., presiding. **Room B.**

Friday Evening, April 30th

6:00 p.m. **WINE TASTING PARTY** A variety of select vintages will be offered for sampling at the free Wine Tasting Party to be held in the Crystal Ballroom of the Fairmont-Mayo Hotel. **Sponsored by the Wine Institute, California Wine Growers Association.**

Saturday Morning, May 1st

9:00 a.m. "DERMATOLOGY SYMPOSIUM"
Brown Spider Bite—Mage Honeycutt, M.D., Little Rock, Arkansas
Cytotoxic Drugs and Psoriasis—Mark A. Everett, M.D.
Drug Interactions—Vincent P. Barranco., M.D.
Tetracycline Photosensitivity—Dennis A. Weigand, M.D.
Panel Discussion—What's New in Dermatology
Doctor Barranco presiding. **Room C.**

9:00 a.m. "INTERNAL MEDICINE SYMPOSIUM"
The Newer Antibiotics: Their Therapeutic Indications and Effectiveness—Frank J. Carey, M.D., St. Louis, Missouri
Allied Health Personnel—Frank A. Riddick, Jr., M.D., New Orleans, Louisiana
The Physicians Assistant Program in Oklahoma—Thomas N. Lynn, M.D. and Mr. William Stanhope
Rayburne W. Goen, M.D., presiding. **Room A.**

9:00 a.m. **"OPHTHALMOLOGY SECTION—MISCELLANEOUS RETINAL PROBLEMS, FLUORESCEIN ANGIOGRAPHY AND PHOTOCOAGULATION"**—William B. Snyder, M.D., Dallas, Texas. Ronald F. Gates, M.D., presiding. **Room E.**

9:00 a.m. **HOUSE OF DELEGATES MEETING** The closing session of the House of Delegates will be held on the fourth floor of the **Tulsa Assembly Center.**

9:30 a.m. **"ACUTE ARTERIAL INJURY"** Panel — Lazar J. Greenfield, M.D., Kemper Lain, M.D., G. Rainey Williams, M.D., Edward W. Jenkins, M.D. Doctor Greenfield presiding. **Room B.**

Saturday Afternoon, May 1st

12:00 p.m. **FREE PICNIC LUNCHEON** Pastrami and corned beef sandwiches, assorted side dishes and relishes, plus beer and soft drinks will be served in the foyer, third floor of the Tulsa Assembly Center. **Sponsored by the Insurance Company of North America.**

1:00 p.m. **"EXPERIENCE OF CANADIAN PHYSICIANS WITH GOVERNMENT CONTROLLED MEDICINE"**—Eugene F. Balangero, M.D., Montreal, Canada. Hillard E. Denyer, M.D., presiding. **Room A.**

2:30 p.m. **"ASK AL CAPP"** Cartoonist-philosopher Al Capp will speak to questions submitted by the audience. Floyd F. Miller, M.D., presiding. **On the stage, third floor, Tulsa Assembly Center.**

Saturday Evening, May 1st

6:00 p.m. **PRESIDENT'S INAUGURAL DINNER-DANCE** The social highlight of the year will begin with a 6:00 p.m. cocktail party in the Pompeian Court, Fairmont-Mayo Hotel, followed by the banquet, inaugural ceremony and entertainment in the hotel's Crystal Ballroom. A gourmet dinner and wine will be the served, entertainment will feature the World Action Singers of Oral Roberts University, and dancing will be to the music of popular Sammy Pagna. Tickets from OSMA at $10.00 each.

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Entertainment Schedule

WINE TASTING PARTY

6:00 p.m. • April 30th • Crystal Ballroom, Fairmont-Mayo

For the third time in recent years, the Oklahoma State Medical Association will co-sponsor a Wine Tasting Party in cooperation with the Wine Institute of the California Wine Growers Association. A variety of California wines will be provided with appropriate commentary from a professional wine authority. There will be no charge for this entertainment feature.

"ASK AL CAPP"

2:30 p.m. • May 1st • Tulsa Assembly Center



For over 30 years you have shared your morning coffee with L'il Abner. At the 1971 OSMA Annual Meeting, you may share an hour or so with the cartoon's creator, Mr. Al Capp. His appearance will be held on the stage in the exhibit area, third floor of the Tulsa Assembly Center. Mr. Capp will work in an informal style, reading and answering questions from a stack of cards submitted by the audience. Don't miss this witty, caustic, contemporary philosopher who, in his own words, is "An authority on nothing with opinions on everything." Doctors and their wives are invited.

INAUGURAL DINNER-DANCE

6:00 p.m. • May 1st • Fairmont-Mayo

Beginning with a cocktail party at 6:00 p.m. in the Fairmont-Mayo's Pompeian Court and concluding with dancing 'til midnight, the President's Inaugural Dinner-Dance is the highlight of the OSMA's Annual social calendar. After cocktails, there is a gourmet banquet with wine service, the inauguration of Lucien M. Pascucci, M.D., as OSMA President, entertainment by the internationally-known World Action Singers of Oral Roberts University, and dancing to the popular Sammy Pagna Orchestra.



WORLD ACTION SINGERS

The World Action Singers appear weekly on television and have had several highly successful network specials. They tour the world in their "ministry of music," specializing in entertaining youth groups with their "Now Generation" singing.

Tickets should be purchased in advance from the Oklahoma State Medical Association, $10.00 each. □

Technical Exhibitors

The Technical Exhibits of the 65th Annual Meeting of the Oklahoma State Medical Association may be seen on the third floor of the Tulsa Assembly Center.

American Medical Facilities Corporation
American Pension Investments, Inc.
Astra Pharmaceutical Products, Inc.
Ayerst Laboratories
Bristol Laboratories
Brunswick Laboratories, Inc.
Coca Cola USA
Dairy Council, Inc.
Encyclopaedia Britannica
Endo Laboratories, Inc.
Flint Laboratories
*Geigy Pharmaceuticals
Hoechst Pharmaceutical Company
Ives Laboratories, Inc.
Eli Lilly and Company
Marion Laboratories, Inc.
Medco Products Co., Inc.
The Medi-Fund Corporation
Medical Consultants of America, Inc.
Medical Services, Inc.
Mid-Continent Surgical Supply Co.
Niagara Cyclo-Massage of Oklahoma
Oklahoma Blue Cross & Blue Shield Plans
Oklahoma Regional Medical Program
Ortho Pharmaceutical Corporation
OSMA Insurance Program
Parke, Davis & Company
Physicians Planning Service
*Roche Laboratories
William H. Rorer, Inc.
Rucker Pharmacal Co., Inc.
Sandoz Pharmaceuticals
Scholastic Systems Inc.
G. D. Searle & Co.
Seven-Up Bottling Company of Oklahoma City, Inc.
Skyline Terrace Nursing Center
Soft Inc.
E. R. Squibb & Sons, Inc.
Stuart Pharmaceuticals, Division of Atlas Chemical Ind., Inc.
S. J. Tutag & Company
The Upjohn Company
Upjohn-Homemakers
Wyeth Laboratories

*Contributor to Scientific Program

Scientific And Institutional Exhibitors

"Skin Allotransplantation and Selected Surgical Office Procedures"—D. B. Stough, III, M.D., Hot Springs, Arkansas

"Surgery for Coronary Artery Disease"—Joseph M. St. Ville, M.D., Tulsa, Oklahoma

"Splenic Arteriography"—Daniel T. Sullivan, M.D., Oklahoma City, Oklahoma

American Cancer Society

American College of Pathologists

Central Child Abuse Registry

Children's Convalescent Hospital

Children's Medical Center, Tulsa

The Kidney Foundation

Oklahoma Chapter, American Association for Inhalation Therapy

Oklahoma Medical Political Action Committee

Saint John's Hospital, Tulsa

AGENDA*
House of Delegates Meetings

ANNUAL MEETING—OPENING SESSION

7:00 p.m., April 29th, Pompeian Court, Fairmont-Mayo Hotel

I. Call to Order
II. Report of Credentials Committee
III. Introduction of Guests
IV. Remarks of Speaker
V. Nominations for Elections
VI. Report of President
VII. Board of Trustees' Report
VIII. Treasurer's Report
IX. Council, Committee Reports
X. Introduction of Resolutions
XI. Necrology Report

(Reference Committees will meet at 9:00 a.m., April 30th, in the Tulsa Assembly Center)

ANNUAL MEETING—CLOSING SESSION

9:00 a.m., May 1st, 3rd Floor, Tulsa Assembly Center

I. Call to Order
II. Report of Credentials Committee
III. Reference Committee Reports
IV. Elections
V. Adjournment

*Condensed Version, Subject to Modification

OFFICERS TO BE ELECTED

President-Elect (One-Year Term)
Vice-President (One-Year Term)
Delegate to the AMA (Two-Year Term)
Alternate Delegate to the AMA (Two-Year Term)
Trustees From Districts VI through X

Oklahoma State Medical Association

1971 DELEGATES AND ALTERNATES

SOCIETY	DELEGATE	ALTERNATE DELEGATE
ALFALFA, WOODS	John X. Blender, M.D.	J. L. Scates, M.D.
ATOKA, BRYAN, COAL	Alfred T. Baker, M.D.	B. B. Coker, M.D.
BECKHAM	William M. Leebron, M.D.	H. K. Speed, M.D.
BLAINE	Billy Dale Dotter, M.D.	
CADDO	A. C. Roberson, M.D.	L. O. Short, M.D.
CANADIAN	F. W. Hollingsworth, M.D.	E. W. Young, M.D.
CARTER, LOVE, MARSHALL	Frank W. Clark, M.D.	Edward L. Koger, M.D.
	James V. Miller, M.D.	Michael W. Brown, M.D.
CHOCTAW, PUSHMATAHA	Bill E. Woodruff, M.D.	Austin W. Haddox, M.D.
CLEVELAND, McCLAIN	William C. McCurdy, M.D.	W. George Long, M.D.
	E. A. McGrew, M.D.	Charles J. Shaw, M.D.
	Y. E. Parkhurst, M.D.	T. A. Ragan, M.D.
COMANCHE, COTTON	William A. Matthey, M.D.	Robert H. Drewry, M.D.
	Robert R. Hillis, M.D.	Paul N. Vann, M.D.
COOKSON HILLS		
CRAIG, DELAWARE, OTTAWA	David Carson, M.D.	Donald H. Olson, M.D.
CREEK	M. S. Bartlett, M.D.	O. H. Patterson, M.D.
CUSTER	Ross Deputy, M.D.	James Harold Tisdal, M.D.
EAST CENTRAL	Ann K. Kent, M.D.	M. O. Lewis, M.D.
	Richard E. Witt, M.D.	Chester K. Mengel, M.D.
	Glen L. Berkenbile, M.D.	Harvey P. Randal, M.D.
	Tom S. Gafford, M.D.	Emil F. Stratton, M.D.
GARFIELD	Mark D. Holcomb, M.D.	Robert D. Shuttee, M.D.
	P. H. Rempel, M.D.	J. W. Stafford, M.D.
	A. B. Wight, M.D.	Joe B. Jarman, Jr., M.D.
GARVIN	M. E. Robberson, M.D.	John M. Moore, M.D.
GRADY	B. C. Chatham, M.D.	
GREER, HARMON	David D. Fried, M.D.	Phillip N. Kingery, M.D.
HUGHES, SEMINOLE	Claude B. Knight, M.D.	Jack W. Parrish, M.D.
JACKSON	Lowell N. Templer, M.D.	Malcolm Mollison, M.D.
JEFFERSON	Harold Stout, M.D.	O. J. Hagg, M.D.
KAY, NOBLE	T. C. Glasscock, M.D.	Vernon C. Merrifield, M.D.
	D. E. Becker, M.D.	Robert W. Gibson, M.D.
KINGFISHER	Frank C. Lattimore, M.D.	Carroll E. Holsted, M.D.
KIOWA, WASHITA	Roy Anderson, M.D.	M. W. Mahone, M.D.
LeFLORE, HASKELL	R. L. Hampton, M.D.	R. W. Lowrey, M.D.
LINCOLN		
LOGAN	Robert J. Hogue, M.D.	Curtis O. Bohlman, M.D.
McCURTAIN	Thomas E. Rhea, M.D.	Thomas D. Howard, M.D.
MURRAY		
NORTHWEST	Richard H. Burgtorf, M.D.	Howard B. Keith, M.D.
	M. K. Braly, M.D.	Thomas P. Bigbee, M.D.
OKFUSKEE	Charles C. Elliott, M.D.	C. A. Cashman, M.D.
OKLAHOMA	H. T. Avey, M.D.	D. D. Albers, M.D.
	Jack A. Barney, M.D.	Charles N. Atkins, M.D.
	Paul A. Barrett, M.D.	H. T. Avey, M.D.
	James P. Bell, M.D.	Charles D. Bodine, M.D.
	John A. Blaschke, M.D.	M. T. Buxton, Jr., M.D.
	D. Kent Braden, M.D.	Donald R. Carter, M.D.
	R. B. Carl, M.D.	Wm. O. Coleman, M.D.
	Charles W. Cathey, M.D.	Wm. J. Craig, M.D.
	Arthur F. Elliott, M.D.	Ernest R. Daffer, M.D.
	J. B. Eskridge, III, M.D.	Charles E. Delhotal, M.D.
	Lynn H. Harrison, M.D.	James P. Dewar, M.D.
	Charles M. Harvey, M.D.	Leonard R. Diehl, M.D.
	Elwood Herndon, M.D.	John W. Drake, M. D.

	Wm. E. Hood, Jr., M.D.	Jim G. Duckett, M.D.
	Richard L. Hughes, M.D.	Paul D. Erwin, M.D.
	Edmond H. Kalmon, Jr., M.D.	James F. Hammarsten, M.D.
	David C. Lowry, M.D.	Thomas H. Henley, M.D.
	Haven W. Mankin, M.D.	Jess Hensley, M.D.
	James E. Mays, M.D.	Felix R. Kay, M.D.
	Robert J. Morgan, M.D.	Neil B. Kimerer, M.D.
	James B. Pitts, M.D.	Bertha M. Levy, M.D.
	Don F. Rhinehart, M.D.	John F. Montroy, M.D.
	Clarence Robison, M.D.	Wm. L. Parry, M.D.
	Bob J. Rutledge, M.D.	Wm. R. Paschal, M.D.
	Marcus B. Shook, M.D.	Donald R. Resler, M.D.
	Bobby G. Smith, M.D.	John W. Richardson, M.D.
	J. B. Snow, Jr., M.D.	Lal D. Threlkeld, M.D.
	Armond H. Start, M.D.	Stephen Tkach, M.D.
	Robert Sukman, M.D.	Marion C. Wagnon, M.D.
	C. Jack Young, M.D.	Julian W. Swann, M.D.
OKMULGEE	R. L. Alexander, M.D.	T. C. Alexander, M.D.
OSAGE	Richard W. Loy, M.D.	Richard F. Harper, M.D.
PAYNE, PAWNEE	Thomas O. Nicklas, M.D.	Taylor D. Wagner, M.D.
	Clifford M. Bassett, M.D.	George R. Smith, M.D.
PITTSBURG	George M. Brown, Jr., M.D.	Joe W. McCauley, M.D.
	Hartzell V. Schaff, M.D.	C. E. Lively, M.D.
PONTOTOC	David C. Ramsay, M.D.	Clarence P. Taylor, M.D.
	Frank J. Martin, M.D.	Ollie McBride, M.D.
POTTAWATOMIE	Leon D. Combs, M.D.	William C. Click, M.D.
	Roy O. Kelly, Jr., M.D.	Jake Jones, Jr., M.D.
ROGERS, MAYES	Larry Young, M.D.	Robert G. Bissell, M.D.
STEPHENS	C. H. Smith, M.D.	W. K. Walker, M.D.
TEXAS, CIMARRON	E. L. Buford, M.D.	
TILLMAN	Jack D. Honaker, M.D.	Joe C. Horton, M.D.
TULSA	Robert L. Anderson, M.D.	Byron L. Bailey, M.D.
	Sumner Y. Andelman, M.D.	Emil M. Childers, M.D.
	Donald W. Bobek, M.D.	Curtis N. Clifton, M.D.
	Rayburne W. Goen, M.D.	Philip D. Diggdon, M.D.
	John E. Kauth, M.D.	Joseph K. Farish, M.D.
	Norman L. Dunitz, M.D.	Jack E. Hale, M.D.
	Homer D. Hardy, M.D.	Edward W. Jenkins, M.D.
	Robert A. Northrup, M.D.	Leonard L. Kishner, M.D.
	Duane E. Brothers, M.D.	C. Frank Knox, Jr., M.D.
	Robert D. Grubb, M.D.	Harry E. Livingston, M.D.
	Emil D. Palik, M.D.	Donald F. Mauritson, M.D.
	James E. White, M.D.	Victor R. Neal, M.D.
	Byron W. Steele, M.D.	Jack W. Newport, M.D.
	Roger V. Haglund, M.D.	Edward O. Nonweiler, M.D.
	Bernard E. Guenther, M.D.	Wm. J. O'Meilia, M.D.
	Frank A. Clingan, M.D.	Hugh Perry, Jr., M.D.
	Clayton E. Woodard, M.D.	Rollie E. Rhodes, Jr., M.D.
	C. S. Lewis, Jr., M.D.	Earl E. Smith, Jr., M.D.
	Floyd F. Miller, M.D.	Dale E. Van Wormer, M.D.
	Jerry Sisler, M.D.	William B. Scimeca, M.D.
WASHINGTON, NOWATA	Clair Liebrand, M.D.	J. W. Cochran, M.D.
	Elvin M. Amen, M.D.	John E. Scott, M.D.
	Orville L. Grigsby, M.D.	John R. Reid, M.D.

WOMAN'S AUXILIARY

OKLAHOMA STATE MEDICAL ASSOCIATION

APRIL 29th, 30th and MAY 1st, 1971 **FAIRMONT-MAYO HOTEL**

TULSA, OKLAHOMA



MRS. WILLIAM M. LEEBRON
Elk City
President



MRS. E. COTTER MURRAY
Oklahoma City
President-Elect



MRS. R. C. L. ROBERTSON
Houston, Texas
President, Auxiliary to the American Medical Association



MRS. RAMSAY H. MOORE
Dallas, Texas
President, Auxiliary to the Southern Medical Association



MRS. PORT JOHNSON
Muskogee
1st Vice-President



MRS. ED L. CALHOON
Beaver
2nd Vice-President



MRS. DANIEL R. STORTS
Tulsa
Recording Secretary



MRS. WILLIAM B. RENFROW
Oklahoma City
Treasurer



MRS. LEONARD W. ROZIN
Oklahoma City
Treasurer-Elect



MRS. DONALD W. BOBEK
Tulsa
Convention Chairman



MRS. JOSEPH L. McDONALD
Tulsa
Convention Co-Chairman

GENERAL INFORMATION

REGISTRATION

Mezzanine—Founders Room
Fairmont-Mayo Hotel

Mrs. Warren G. Gwartney, Chairman

Thursday, April 29th	12:00 noon-5:00 p.m.
Friday, April 30th	8:00 a.m.-5:00 p.m.
Saturday, May 1st	8:00 a.m.-12 noon

HOSPITALITY ROOM

Mezzanine—Founders Room
Fairmont-Mayo Hotel

Mrs. Harold W. Calhoon, Chairman

This room will be open during registration hours, Thursday, Friday and Saturday, for the convenience of guests. Refreshments will be available, including a Continental breakfast Friday and Saturday.

DOCTORS' DAY EXHIBITS

Mezzanine—Founders Room
Fairmont-Mayo Hotel
Thursday, Friday and Saturday

Mrs. Benjamin H. Gaston, Chairman

MEDICAL ADVISORS

Scott Hendren, M.D.
Hillard Denyer, M.D.
Ed L. Calhoon, M.D.

CONVENTION COMMITTEE

CHAIRMAN: Mrs. Donald W. Bobek
CO-CHAIRMAN: Mrs. Joseph L. McDonald

Courtesy	Mrs. Allen B. Eddington
Credentials	Mrs. Frank L. Flack
Decorations	Mrs. James E. Winslow
Hospitality	Mrs. Harold W. Calhoon
Luncheon	Mrs. Robert B. Williams
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Tickets	Mrs. Raymond Peeples

Tickets for Past-Presidents' Breakfast, Luncheon and Style Show, and the Workshop Breakfast will be on sale at the Registration Desk in the Founders Room.

PROGRAM

THURSDAY, APRIL 29th, 1971

1:30 p.m.-5:00 p.m.—REGISTRATION AND HOSPITALITY
Mezzanine — Founders Room — Fairmont-Mayo Hotel

2:00-4:00 p.m.—PRE-CONVENTION BOARD MEETING, Summit Club—Governor's Suite, Mrs. William M. Leebron, President, presiding

FRIDAY, APRIL 30th, 1971

8:00 a.m.—PAST-PRESIDENTS' BREAKFAST, Studio Room, Mezzanine, Fairmont-Mayo Hotel, Mrs. I. H. Nelson, Chairman

8:00 a.m.-5:00 p.m.—REGISTRATION AND HOSPITALITY, Founders Room, Mezzanine, Fairmont-Mayo Hotel

9:00 a.m. — FIRST GENERAL SESSION, Emerald Room, Mezzanine, Fairmont-Mayo Hotel, Mrs. William M. Leebron, President, Woman's Auxiliary to the Oklahoma State Medical Association, presiding

CALL TO ORDER: Mrs. William M. Leebron
INVOCATION: Mrs. Louis Floyd

PLEDGE OF LOYALTY: Mrs. Lucien Pascucci, wife of the President-Elect of the Oklahoma State Medical Association

WELCOME: Mrs. George Krietmeyer

RESPONSE: Mrs. Richard Taliferro

ANNOUNCEMENTS: Mrs. Donald Bobek

GREETINGS: Ed L. Calhoon, M.D., President, Oklahoma State Medical Association

INTRODUCTION OF SPECIAL GUESTS: Mrs. R. C. L. Robertson, Houston, Texas, President, Woman's Auxiliary to the American Medical Association; Mrs. Ramsay H. Moore, President, Woman's Auxiliary to the Southern Medical Association

ROLL CALL BY COUNTIES: Mrs. Daniel Storts, Secretary

REPORT OF CREDENTIALS COMMITTEE: Mrs. Frank Flack

READING OF MINUTES: Mrs. Daniel R. Storts, Secretary

TREASURER'S REPORT: Mrs. William B. Renfrow

REPORTS OF OFFICERS: (Two minute reports)
First Vice-President: Mrs. Port Johnson
Second Vice-President: Mrs. Ed L. Calhoon
Editor of *Sooner Physician's Wife:* Mrs. Richard Witt
Editor of Auxiliary Page in *The Journal:* Mrs. M. Thomas Buxton, Jr.

Report of Nominating Committee: Mrs. E. Cotter Murray, President-Elect

Election of Officers

12:00 noon—LUNCHEON AND STYLE SHOW, Crystal Ballroom, 16th floor, Fairmont-Mayo Hotel
INSTALLATION OF OFFICERS: Mrs. R. C. L. Robertson
SPEAKER: Mrs. R. C. L. Robertson, President, Woman's Auxiliary to the American Medical Association
STYLE SHOW: Fashions by Woolf Bros.

2:30 p.m.—SECOND GENERAL SESSION, Emerald Room, Mezzanine, Fairmont-Mayo Hotel, Mrs. William M. Leebron, presiding

ANNOUNCEMENTS: Mrs. Joseph L. McDonald

REPORTS OF COMPONENT AUXILIARY PRESIDENTS:

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PRESENTATION OF PRESIDENT'S GAVEL AND PIN: Mrs. William M. Leebron

INAUGURAL ADDRESS: Mrs. E. Cotter Murray, President, Woman's Auxiliary to the Oklahoma State Medical Association

PRESENTATION OF PAST-PRESIDENT'S EMBLEM: Mrs. J. Hartwell Dunn

MEMORIAL SERVICE: Mrs. E. C. Mohler
ADJOURNMENT

5:15 p.m.—Members-at-Large Tea, President's Suite, Fairmont-Mayo Hotel

SATURDAY, MAY 1st, 1971

8:30 a.m.-12 noon—REGISTRATION AND HOSPITALITY, AMA-ERF Booth

8:30 a.m.—POST-CONVENTION WORKSHOP BREAKFAST

9:00 a.m.—POST-CONVENTION WORKSHOP

Outgoing Board Members, Councilors, Component Auxiliary Presidents, Incoming Board Members, Councilors, Component Auxiliary Presidents and any auxiliary member who would like to attend. Members-at-Large are cordially urged to attend.

2:30 p.m.—AL CAPP, admittance by ticket only. Tickets are complimentary.

6:00 p.m. — Social Hour, Pompeian and Founders Room, Fairmont-Mayo Hotel

7:00 p.m.—President's Inaugural Dinner-Dance, Crystal Ballroom, Fairmont-Mayo Hotel

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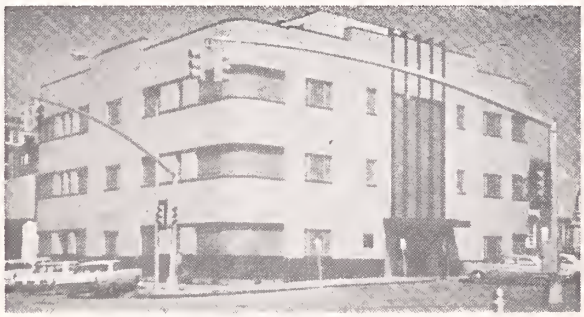
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The JOURNAL
of the Oklahoma State Medical Association

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August Issue

Editorial, Scientific, Book Reviews	June 15, 1971
Advertising Copy	July 15, 1971
News Copy, Miscellaneous Ads	August 1, 1971

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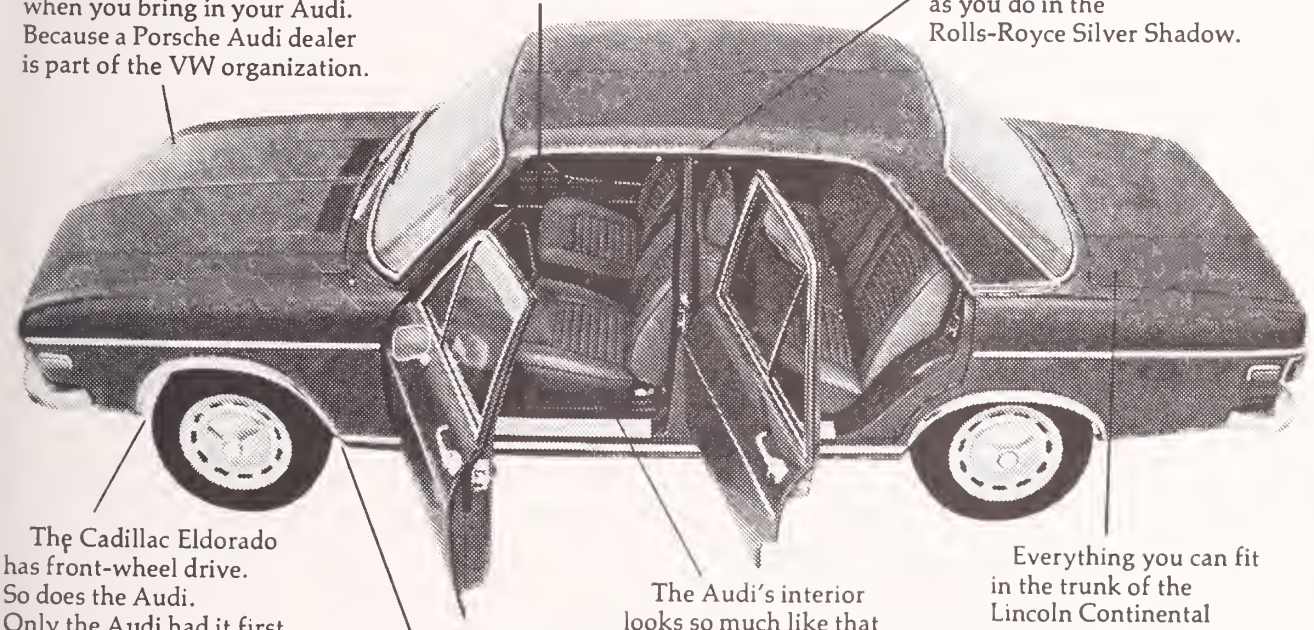
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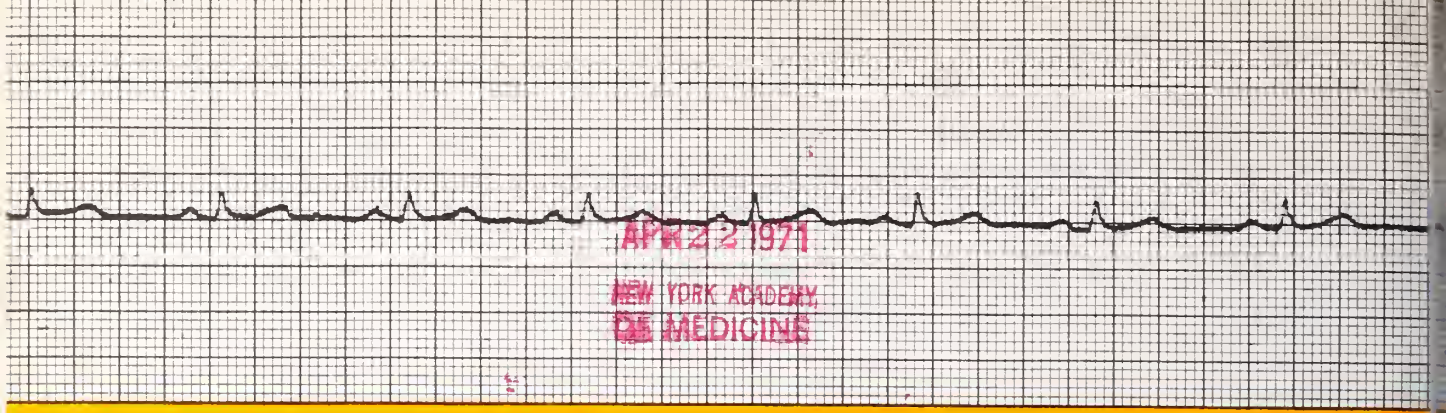
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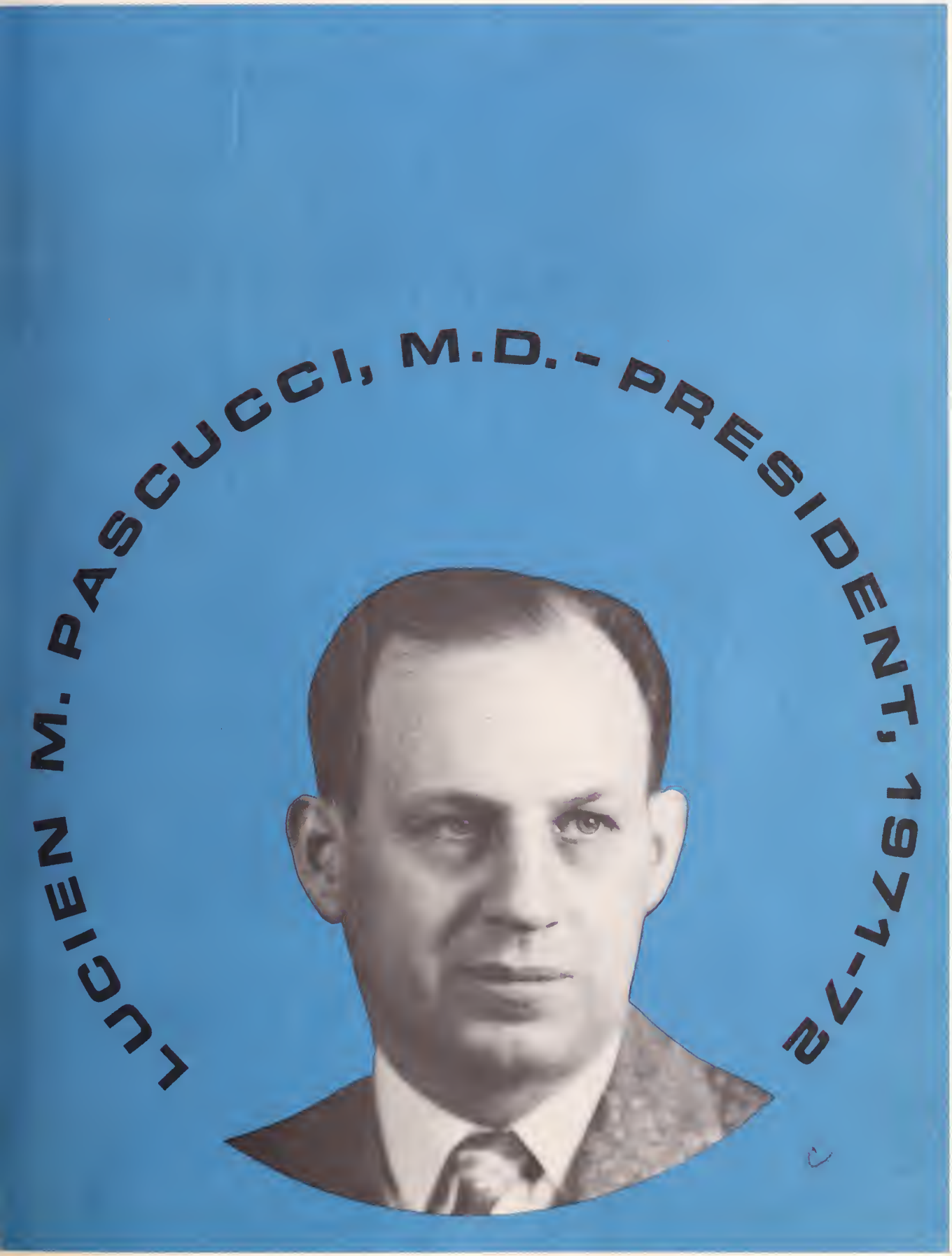
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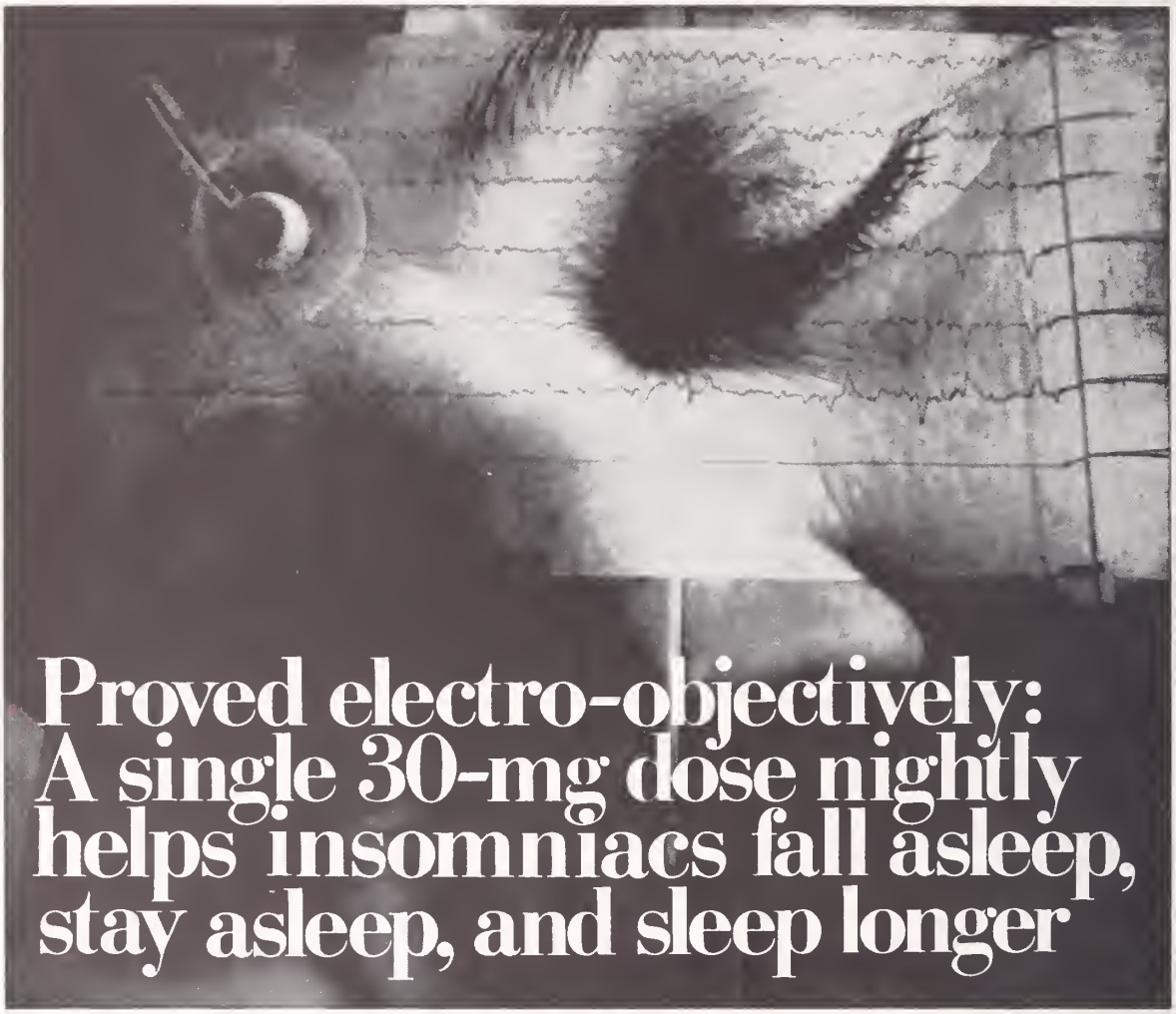
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OKLAHOMA STATE MEDICAL ASSOCIATION

Volume 64—Number 5—May 1971

BALCONY





Proved electro-objectively: A single 30-mg dose nightly helps insomniacs fall asleep, stay asleep, and sleep longer

Controlled studies of 23 insomniac and 13 normal subjects treated with Dalmane (flurazepam HCl) in five sleep laboratories generated over 4000 hours of electroencephalographic, electro- oculographic and electromyographic tracings. These studies revealed that Dalmane 30 mg nightly usually induces sleep in 22 minutes and provides seven to eight hours of sleep.[1,2,3]

Moreover, Dalmane 30 mg was found to be useful in all common types of insomnia in which it was studied. Of drugs studied in a sleep laboratory,' Dalmane 30 mg was the only one that consistently reduced sleep induction time and maintained sleep nightly for 14 consecutive nights of use.

Confirmed clinically

Fifty-three controlled studies using a paired-night, double-blind crossover design have evaluated Dalmane clinically. In the majority of these, Dalmane (flurazepam HCl) significantly reduced sleep induction time and increased sleep duration. Dalmane and a placebo were alternated on successive nights in 2010 insomniacs, 1706 of whom were studied for a single night-pair, and the remainder for as many as fifteen paired-nights. A patient preference for Dalmane was apparent in the paired-night studies.

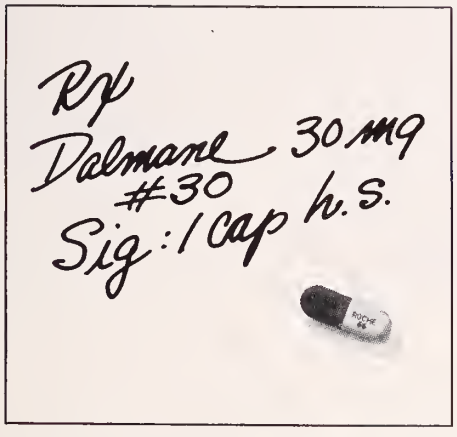
Dalmane was also preferred to certain hypnotics in two separate preference studies. In each of two double-blind studies, Dalmane 30 mg retained effectiveness for the total period of seven consecutive treatment nights, according to subjective/objective evaluations.

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References: 1. Kales, A., *et al.*: "Effectiveness of Sleep Medications: All-Night EEG Studies of Hypnotic Drugs," in Proc. 7th Internat. Cong. Electroencephal. and Clin. Neurophysiol., San Diego, Calif., Sept. 13-19, 1969. **2.** Kales, A., *et al.*: "Psychophysiological and Biochemical Changes Following Use and Withdrawal of Hypnotics," in Kales, A. (ed): *Sleep: Physiology and Pathology*, Phila., Lippincott, 1969, p. 331. **3.** Data on file, Medical Department, Hoffmann-La Roche Inc.



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Precautions: In elderly and debilitated, initial dosage should be limited to 15 mg to preclude oversedation, dizziness and/or ataxia. If combined with other drugs having hypnotic or CNS-depressant effects, consider potential additive effects. Employ usual precautions in patients who are severely depressed, or with latent depression or suicidal tendencies. Periodic blood counts and liver and kidney function tests are advised during repeated therapy. Observe usual precautions in presence of impaired renal or hepatic function.

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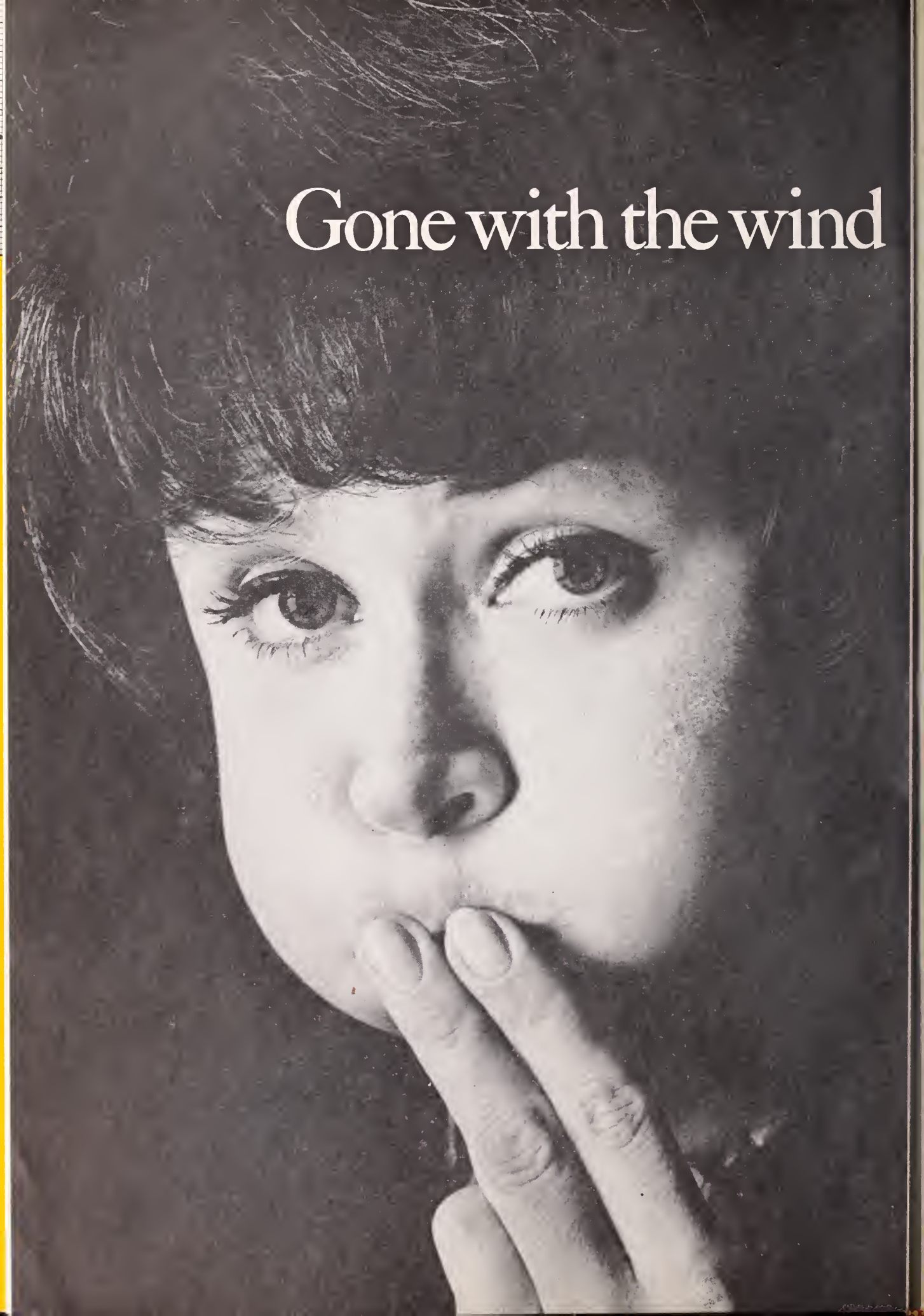
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*Slanger, A.: Med. Times *94*:150 (Feb.) 1966.

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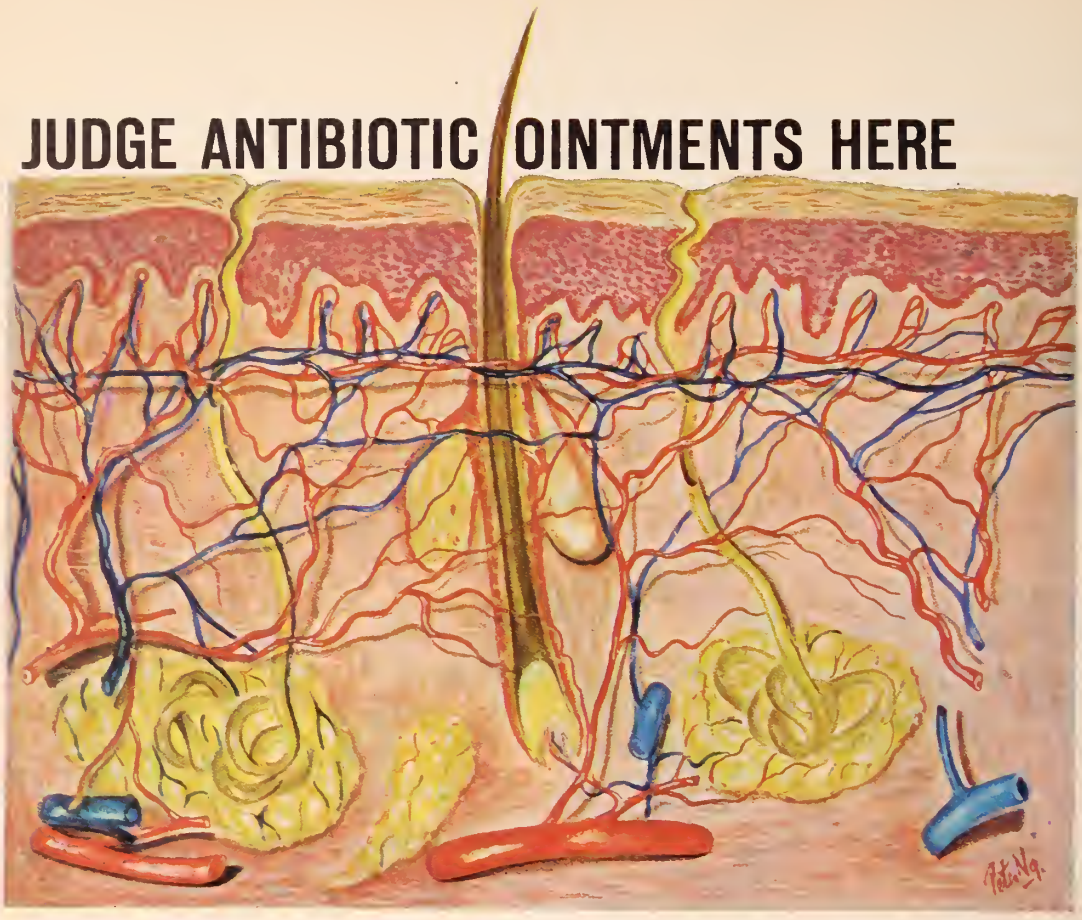
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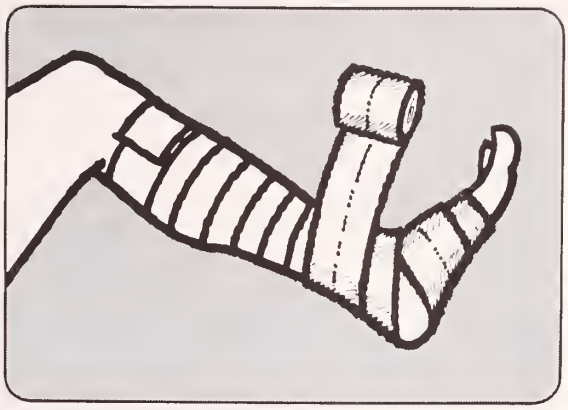
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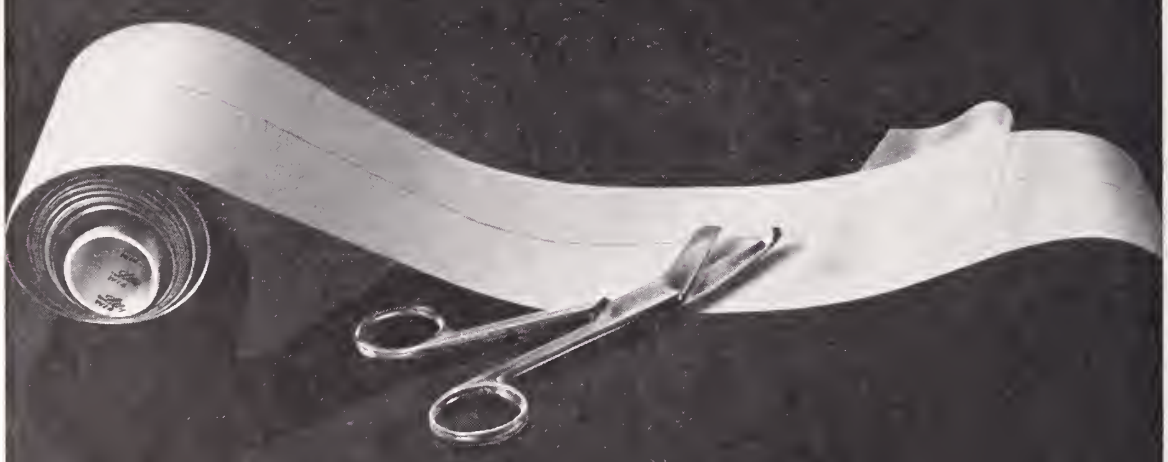
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Lilly

Dr. Luke and Our Problems

READING THE newspapers, listening to the radio and watching television I readily accept the poll-supported conclusion that America's greatest anxieties and concerns involve the issues of crime and violence, environmental pollution and the drug epidemic. Certainly I share and understand these anxieties. As a practicing physician I am, perhaps, more directly involved with these problems and should, therefore, devote more time and effort to their solution than the average citizen. I understand and accept this responsibility.

What I cannot understand or accept is our state's refusal to provide adequate support for the only state agency that can determine the dimensions of these problems and thus give direction to our efforts to solve them. Without an adequately financed, expertly supervised, completely equipped and competently staffed Medical Examiner's Office, we cannot hope to comprehend the problems let alone find their solutions.

In spite of all the blustering rhetoric of politicians and civic leaders, in spite of the dire warnings from stern-faced commentators, in spite of screaming headlines and sobbing parents and in spite of our admission of ignorance about the problems, we refuse to vitalize the one most reliable source of information and guidance, the Office of the State Medical Examiner.

This hypocrisy costs us dearly. How much it costs in lives and dollars we will never know. How many 'highway accident' deaths occur due to carbon monoxide poisoning from automobile exhaust systems? How many millions of dollars are spent for the care of persons poisoned by polluted air, water and beverages? And how many persons have died from such poisoning? How many of our youths will die this year because the illict drug they thought they were using was something else, never correctly identified? How many millions of dollars did we spend last year for the incarceration of 'murderers' who never committed murder? And how much was spent in their apprehension and trial? How many unsuspected murderers are free?

Who can say? How can we know?

Only an expert forensic pathologist can say, and we can know only if we provide the laws, the means, the resources and the support which such an expert must have at his disposal. Doctor James L. Luke, Oklahoma's first State Medical Examiner is such an expert. In his article which appears in this issue, he tells us what is needed and effectively illustrates how we have failed to satisfy those needs.

Doctor Luke is a competent, dynamic and dedicated scientist, a compassionate physician and a concerned and conscientious citizen. He is one of the few fully qualified, practicing forensic pathologists in the nation. As a result of the frustration which he feels so acutely and which he describes so well in his article, Doctor Luke has resigned his position and is leaving the state. Our great fortune in having had Doctor Luke's expert services for four years emphasizes our great loss in his departure.

The fact that Doctor Luke set out to get things done, the fact that he was willing to fight battles for his convictions, the fact that he performed his task with zeal and unbridled energy made it inevitable that he would provoke the ire of some. But the fact that he is deeply concerned about our country's major ills, that he trained himself so thoroughly and that he works so hard to help cure those ills warrants the admiration and gratitude with which he is bestowed. His successor's task will be a bit easier because of Doctor Luke. How effectively his successor performs in helping solve our problems depends upon the support we give him. He deserves more than we gave Doctor Luke.—*MRJ* □



It is a privilege to assume the high office of our state society after having been apprenticed to Doctor Ed Calhoon who, in turn, has served the past year with distinction. His determination, homespun philosophy, common sense, and guidance will be an inspiration to me during what I anticipate will be a difficult year. Never before have I been faced with as great a challenge and an opportunity for positive leadership and accomplishment.

American medicine is at the crossroads and the profession has been caught in the traffic of social and economic progress, spurred and propelled forward by the pressure of national political expediency. We had better read and heed the signs. The hazards are many.

The existence of the practice of medicine as a free enterprise is, without a doubt, threatened. We must not only resist but combat this threat with one of the most powerful means at our disposal—the honest and sincere expression and effort directed to the best interest of our patients. This will necessitate concessions which will, in turn, affect our living habits and mode of practice to an extent which will be determined only by the future.

During the past twelve months I have come to appreciate the significance and magnitude of the undertaking upon which we have already embarked. I plan in future letters to dwell upon some of the problems which are already with us. Far be it for me to suggest that I can supply the solutions or that as president I can alter the course of events. The realization is forced upon me that my efforts will be minimal in proportion to those of you that I hope will be deeply involved. I refer to the members of the 25 or 30 committees, their chairmen, the board of trustees and the delegates. While we as members will be intermittently involved, the necessary daily boring and burdensome tasks will be performed by our capable and proven trio of Don Blair, Dave Bickham, and Edward Kelsay.

Hence I urge the cooperation of the entire membership, be it in small or large measure. This is your society and any noteworthy accomplishments will be your reward as well as mine. □

Sincerely,

Lucien H. Pascuzzi

OSMA JOURNAL/scientific

Primary Omental Torsion

H. JACK BROWN, M.D., F.A.C.S.*
R. BARRETT NOONE, M.D.**

Torsion and infarction of a segment of the greater omentum produces symptoms often confused with acute appendicitis. Operation is necessary to establish the diagnosis.

TORSION AND infarction of a segment of the greater omentum may produce signs and symptoms similar to appendicitis. Since Eitel[1] in 1899 first described a case of omental torsion unrelated to any other abdominal lesion, there have been approximately 180 reported cases.[2-10] All of these cases came to surgery and the correct preoperative diagnosis was recorded only once. Eighty-three percent had a preoperative diagnosis of appendicitis and 15 percent were diagnosed preoperatively as acute cholecystitis. This is not surprising when one sees that the initial pain was felt in some location other than the right lower quadrant in 62 percent of patients, but eventually localized to the right lower quadrant in 79 percent. Pain remained in the right upper abdomen in 13 percent. Eight percent had left-sided abdominal pain.

All of these patients experienced pain of an acute onset which was constant. Nausea was present in 47 percent and vomiting was recorded in 30 percent of cases. Anorexia was recorded in only seven cases.

Males outnumbered females by 1.5 to 1.0. The patients varied in age from three to 75 years. Fifty-three percent of cases were in the 26 to 50 year age groups. Fifteen percent were under the age of 12 years and 19 percent were over 50 years of age.

The patients' temperature on admission was reported in 123 of the cases. Of these, 61 had a temperature less than 100° F, 51 were between 100 - 101° and 11 had a temperature greater than 101° F. Findings ranged from mild abdominal tenderness and spasm to exquisite tenderness and frank rigidity. A mass was palpated in 22 percent of the cases. Leukocytosis in excess of 12,000 WBC/mm^3 was recorded in 53 of 94 adult patients and in 16 of 19 children under the age of 13 years. Twenty-one adults and four children had a neutrophil response greater than 80 percent.

All reported cases were subjected to celiotomy. Free intra-abdominal fluid was described in 77 percent of cases. This was usually serosanguineous but was described as turbid in a few cases. The size of the

*The Oklahoma City Clinic, 301 N.W. 12th, Oklahoma City, Oklahoma.
**Department of Surgery, Hospital of the University of Pennsylvania, Philadelphia, Pennsylvania.

infarcted omental segment varied from 2.5 X 2.5 cm to 27.5 X 20 cm. with a mean of 8 X 8 cm. The entire greater omentum was reportedly involved in three patients and torsion of an accessory omentum was described nine times. Excision of the infarcted segment is the usual treatment but three patients had simple derotation of the torsion.

There was only one recorded death. This was due to a postoperative thyroid crisis in a patient who had undergone derotation of the omental torsion.

Our recent experience with four cases of omental torsion has paralleled the experience of others.

CASE ONE

A 26-year-old male pilot was admitted to Sheppard U.S.A.F. Hospital December 26, 1968, with a 36 hour history of constant right lower quadrant pain that was increasing in severity. He denied nausea, vomiting, and anorexia. Temperature was 98.8° F. The patient's abdomen was flat and soft with direct localized tenderness in the right abdomen three centimeters above McBurney's point. There was marked rebound tenderness in the same area and referred rebound tenderness to this area from other parts of the abdomen. There was no mass palpated. White blood cell count was 12,400 WBC/mm^3 with 66 percent neutrophils. The patient was explored with a preoperative diagnosis of acute appendicitis. Intraperitoneal serosanguineous fluid was present. The appendix, small bowel, and gallbladder were normal. A 3 X 4 cm. necrotic section of omentum with torsion of its vascular pedicle was found overlying the cecum. The involved omentum was excised. The patient's postoperative course was uneventful and he was dismissed from the hospital on the fourth postoperative day.

CASE TWO

A 34-year-old businessman was admitted to Presbyterian Hospital, Oklahoma City, Oklahoma, on February 28, 1970, with a 12 hour history of constant right midabdominal pain which had been of sudden onset immediately after arising from bed. He denied nausea, vomiting and anorexia. He had a past history of a duodenal ulcer and admitted to drinking a large amount of alcoholic beverages the night prior to the onset of pain. Temperature was 99° F. Moderate tenderness, muscle spasm, and rebound tenderness were confined to the right abdomen. The maximum point of tenderness was poorly localized in the right midabdomen. Upright roentgenograms of the patient's chest and abdomen were normal. Hemogram showed 9,900 WBC/mm^3 with 60 percent neutrophils. Serum amylase was normal. Nasogastric suction and intravenous fluids were begun. Twelve hours after admission pain and tenderness had increased and were now sharply localized to an area three centimeters above McBurney's point. A mass was not palpated. Repeat white blood count was 8,200 WBC/mm^3 with 66 percent neutrophils. A diagnosis of "acute surgical abdomen" was made with the differential diagnosis consisting of acute appendicitis, acute cholecystitis and perforated duodenal ulcer. The patient's abdomen was explored through a midabdominal vertical incision. Serous intraperitoneal fluid was present. A 3 X 5 cm. portion of infarcted omentum with torsion of its vascular pedicle was found and excised from the right midabdomen. The patient's postoperative course was uneventful and he was dismissed from the hospital on the fourth postoperative day.

CASE THREE

A 13-year-old female was admitted to the Hospital of the University of Pennsylvania on November 11, 1969, with a three day history of rightsided abdominal pain ultimately becoming localized in the right lower abdominal quadrant. The pain was constant and did not radiate. She had had anorexia for 24 hours prior to admission and had vomited once. Muscle spasm and tenderness were present at McBurney's point. A mass was not palpated. Her temperature was 100° F. White blood count was 11,200 WBC/mm^3 with 72 percent neu-

trophils. A diagnosis of acute appendicitis was made. At surgery a 10 X 15 cm. mass of black necrotic omentum was found overlying a grossly normal appendix. There was torsion of the vascular pedicle to this segment of omentum which was excised. Her postoperative course was uneventful and she was discharged from the hospital on the fifth postoperative day.

CASE FOUR

A 28-year-old female in the seventh month of pregnancy, was admitted to Pennsylvania Hospital on December 30, 1970, with a complaint of abdominal pain. Twenty-four hours preceding admission she noted the sudden onset of right upper quadrant abdominal pain. The pain was constant and nonradiating and localized to an area between the right costal margin and the enlarged pregnant uterus. No nausea, vomiting, diarrhea, constipation or fever were noted, although she admitted anorexia. Her temperature was 98.4° F. Abdominal examination demonstrated tenderness localized to the right upper quadrant, with referred and rebound tenderness in the same area. Involuntary guarding was noted in the absence of rigidity. Pelvic examination confirmed a seven month-sized uterus with viable fetus. White blood count was 19,700 with 78 percent neutrophils. A preoperative diagnosis of acute appendicitis was made. Cholecystitis was entertained, but thought unlikely because of the lack of tenderness immediately below the costal margin.

Exploratory laparotomy demonstrated a necrotic section of greater omentum located in the right upper quadrant. The necrotic section was 3 X 4 cm. in size and was attached to a six centimeter twisted vascular pedicle. Resection of the omental pedicle was completed. An incidental appendectomy was performed. The patient's postoperative course was satisfactory and she was discharged from the hospital on the sixth postoperative day.

DISCUSSION

Primary omental torsion assumes an importance when one considers the number of so-called "negative appendectomies" at any general hospital. Surgeons should think of this condition and look for it when confronted with a normal appendix and a preoperative diagnosis of acute appendicitis. Surgery will continue to be a prerequisite for making this diagnosis as the symptoms and physical findings too nearly approximate other acute abdominal conditions requiring surgical exploration. The process itself would probably ultimately subside without surgery, but it is interesting to note that of the 165 cases reviewed by Mainzer, 48 had had symptoms longer than three days and 13 had been symptomatic more than a week. The adhesions produced by omental infarction and resolution might result in future episodes of mechanical small bowel obstruction, although there is no data to support this supposition.

Various theories of pathogenesis or predisposing causes to omental torsion have been expounded. It has been stated that this condition is usually associated with anomalies of the omental pedicle such as tongue-like projections from the free edge, bifid omentum or accessory omentum. Others have felt the size and disposition of omental fat or generalized obesity were important considerations. However, only 12 percent of the reported cases were reported to be obese. Trauma, overeating, overexertion, sudden change in body posture, coughing or straining have been implicated as exciting factors but none of these

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were consistently present. One of our four patients was in the last trimester of pregnancy.

It can be concluded that primary omental torsion is a documented entity with signs and symptoms identical to other acute abdominal conditions (especially appendicitis), and the treatment is surgical exploration with excision of the infarcted omental segment.

SUMMARY

Primary idiopathic torsion of the greater omentum with segmented infarction produces symptoms of an acute intra-abdominal crisis necessitating surgery to establish a diagnosis. This condition has been confused with acute appendicitis in 83 percent of 180 reported cases. Four typical cases are described. The treatment is surgical excision of the infarcted segment of omentum. □

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Office Evaluation of Hearing

KINSEY M. SIMONTON, M.D.

Observation of ability to communicate while taking the clinical history, a few direct questions and brief tests using simple instruments allow the practitioner to estimate hearing ability and to advise his patient concerning hearing.

SOUND IS A vibration in air. As it reaches the ear it is also mediated by bone and fluid. Sound has two parameters, frequency which we recognize as pitch and intensity which we recognize as loudness.

Frequency is measured in cycles per second (cps). Doubling the frequency equals one musical octave. Musical tones and many voice sounds have harmonics which are overtones one, two, and three octaves higher than the basic tone. Middle C on the piano is at 512 cps, and the frequency range of the human ear is from 32 to 16,000 cps. The upper limit of audible frequencies progressively lowers with age. The speech zone of 500 to 2,000 cps is in the middle of the frequency range of the ear. The voice sounds most important to hearing speech are not the fundamental sounds produced by vibrations of the vocal cords but the first and second harmonics of the fundamental sounds.

The vowels are at the lower end and the consonants are at the higher end of the speech frequency range. This explains the dilemma of the older person who says, "Don't shout at me. I can hear you, I just can't understand." The reason is that he hears the low tones but misses enough of the consonants not to understand what is being said. The person with high-tone loss hears traffic noises, which are of low frequency, but misses the bell on the telephone. He is helped by exchanging the telephone bell for a buzzer.

Intensity or loudness is expressed in decibels. The decibel equals one-tenth of a bel. The bel refers to a logarithm of base ten and expresses a ratio of sound energy. Zero decibels equals one unit of energy, ten db equals ten units, 20 db 100 units, and 90 db equals one billion units of energy. The human ear can perceive a tone of one db intensity and can tolerate 100 db without pain. Prolonged exposure to sounds of 90 db or greater will damage most ears. A change of one db energy approximates a just perceptible change in loudness.

Conductive hearing loss results from a mechanical interference with passage of

From the Mayo Clinic and Mayo Foundation, Department of Otorhinolaryngology.

Read at the meeting of the Oklahoma City Clinical Society, Oklahoma City, October 26th to 28th, 1970.

sound in the ear. An example is blocking the external canal with a finger. Conduction deafness reduces loudness but does not reduce the intelligibility of the sound. If the loudness is great enough to be heard it is readily understood. On the other hand, sensorineural loss often affects only part of the frequency range. Speech sounds are sufficiently loud but are muffled and indistinct. This is the problem of the senior citizen who has lost hearing for high tones.

Evaluation of hearing loss begins with the history. The time of onset is significant. It is normal to begin losing hearing for high tones at about the age of 50 years. This varies with different individuals and somewhat with families, but hearing loss which begins at age 50 or beyond usually is presbycusis or the loss of hearing of the aged and is a loss for high tones. When the loss appears in a young individual following infection, it is probably a conductive hearing loss. Insidious loss of hearing beginning at age 20 to 50 years suggests otosclerosis. This is a conductive loss probably correctable by surgical treatment and certainly suitable for use of a hearing aid. Severe hearing loss which develops abruptly, within one day to one week, is a medical emergency. The loss is sensorineural and usually is permanent, although in a few cases hearing can be salvaged by prompt and vigorous treatment.

Hearing tests are the next step in hearing evaluation. The spoken or whispered voice is a time-honored means of evaluation. This is a very rough test with many inaccuracies. There are three sources of error: (1) The subjective judgment of the patient, (2) the subjective judgment of the examiner in estimating the loudness of his voice, and (3) the noise background in the examining room. It is almost impossible to judge the loudness of one's own voice and this is influenced strongly by noise background. The noise level of 50 db or more in the average "quiet" office is sufficient to hide many minor hearing losses. However, the patient's response to the examiner's voice during the taking of the history will reveal many significant hearing losses. The examiner can get a clue to the presence of high-tone hearing losses by testing with words containing predominantly sibilant sounds, s, ch, and z, such as *sizzling* or *scissors.*

The watch tick or coin click are popular screening tests for hearing which also have serious limitations. The loudness of the individual watch or coin click should be calibrated by determining the distance at which a group of young individuals without known hearing loss detect the sound. These sounds are relatively high in pitch. They provide a good screen when heard, but failure to hear them is difficult to interpret. The person whose hearing loss is for tones higher than 2,000 cps may have difficulty hearing a watch tick or coin click but have no handicap for conversation.

Much more accurate screening can be done with a simple pure-tone audiometer. The audiometer is an instrument which can deliver tones of controlled intensity and frequency. An instrument capable of delivering tones by air conduction over a frequency range from 250 to 8,000 cps is adequate for most non-otolaryngologists. The instrument can be used in either of two ways. It can be used as a pure screening device in which the intensity is set at a level greater than threshold but lower than the level of disability; thus, 25 db frequently is used as a screening intensity. The frequencies are then presented to the ear in short bursts of tone. The individual who reports hearing all of the frequencies is assumed not to have a disabling hearing loss. Frequencies which are not heard can be further checked to determine the threshold, if desired. This intrument can also be used to determine air-conduction thresholds. In this test each frequency is presented to the ear at various intensities until the least detectable intensity is determined. This is the threshold of hearing for that frequency. This test produces a curve and provides a great deal more information than the sweep test.

The tests described give indications of the degree of hearing disability but little indication of its type, whether conductive or sensorineural. A simple tuning-fork test gives valuable information for this differ-

entiation. The most valuable single tuning fork is one of 512 cps. Forks of lower frequency are likely to be felt rather than heard while those of higher frequency may be heard around the head by the opposite ear. Weber's test compares the loudness by which bone-conducted sound is heard by the two ears. The stem of the activated tuning fork is placed against the midline of the skull or against the upper teeth. In cases of unilateral hearing loss the sound is heard louder in the normal ear when the loss is in the nerve system or louder in the abnormal ear when the loss is in the conductive system. Rinne's test compares the duration of hearing by bone conduction and air conduction. The stem of the fully activated tuning fork is pressed firmly against the bone of the skull an inch behind and slightly above the external auditory canal. When the sound is no longer heard the vibrating tines are held one centimeter from the external auditory meatus. The normal ratio (positive Rinne) is approximately double the hearing by air conduction than by bone conduction. This is present in ears with normal conductive apparatus. In the abnormal response (negative Rinne) hearing by bone conduction is longer than hearing by air conduction. This indicates a conductive deficit of approximately 40 db or more. Small degrees of conductive deficit result in a reduced positive response.

Tuning forks may also be used to estimate the threshold of hearing. This is a double subjective test which compares the patient's judgment of the end point of audible vibration with the examiner's judgment of the same end point. (Determination of the end point of a slowly decaying sound is difficult and inconsistent.) The examiner obviously must know his own hearing threshold to interpret the test. This test requires a minimum of two tuning forks. Most useful are those having frequencies of 512 and 2,048 cps. These frequencies represent the upper and lower range of frequencies in the human voice and are therefore important in judging hearing disability.

The reasons for evaluating hearing are (1) to advise the patient of the state of his hearing, (2) to estimate the degree of disability, and (3) to determine whether he should be advised to use a hearing aid or to be referred to an otologist for further examination and treatment. The hearing level tells much of the state of hearing and degree of disability. From the use of history, voice test, and tuning forks, one can form a rough estimate of hearing ability. The ability to communicate with the patient during the examination gives an estimate of hearing handicap, but the history often indicates a greater degree of handicap than is observed in the office. Face-to-face conversation at close range in the relative quiet of the office constitutes a very favorable environment for communication. An individual who functions adequately in this environment may have significant trouble in unfavorable communication environments such as a social gathering with several voices present simultaneously or the home where the patient may attempt to converse from one room to another or against a background of noise from television, radio, or running water. More definite tests with the voice at a measured distance, with tuning forks, or with a watch tick can add confirming evidence to the observations made during conversation. Screening tests by audiometry, particularly if the threshold of hearing is determined, give more reliable information concerning the state of the hearing. These techniques will allow any physician to detect definite hearing disability, although borderline disabilities are difficult to detect by such simple methods. Your patient can at this point of the exami-

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nation be advised of the degree of disability estimated.

Decisions relative to prognosis and possibilities of help from treatment require the determination of whether the hearing loss is conductive or sensorineural in origin. The simplest method of determining this is by using the tuning forks as described earlier. In general, sensorineural hearing losses do not respond to treatment. This applies particularly to those losses present from birth, which develop gradually, or which develop after the age of 50 years. An occasional exception is the sensorineural hearing loss which develops abruptly. This may be overnight or within a week. This loss of hearing may or may not be accompanied by tinnitus. Possible causes for abrupt hearing loss are occlusion of the internal auditory artery, viral labyrinthitis, neurilemmoma of the acoustic nerve, and initial attack of Meniere's disease, collagen disease, or congenital syphilis. A few cases in these categories respond to treatment applied promptly and vigorously. The diagnosis requires much more sophisticated hearing evaluation than is considered in this discussion; hence, these patients should be referred to an otologist.

The ability to use a hearing aid varies widely among individuals with sensorineural hearing loss. A very rough estimate of the ability can be obtained by determining if the individual communicates better when spoken to in a loud voice than when spoken to in a voice of normal loudness. Hearing losses which involve only the high tones do not always respond well to amplified sound which is unpleasantly loud for the low tones which are heard normally but which does not make the speech more distinct. Conditions such as Meniere's disease and acoustic neuroma cause considerable distortion of sound. This distortion increases with increases in intensity. While defective at threshold, the ears in such cases often will not tolerate amplification. Nevertheless, many persons with sensorineural hearing loss do gain distinct benefit from the use of a hearing aid.

It is difficult to determine usefulness of a hearing aid in the quiet environment of the office. Response may be much more favorable there than in a background of noise found in the daily routine of one's life. Hearing-aid evaluation services, available at most large medical centers, university centers, or through the speech and hearing societies of many of our major cities, allow an estimate of the probable usefulness of hearing aids for questionable cases. Another method of determining the effectiveness is to have the patient wear a hearing aid on a trial basis.

Conductive hearing loss responds well to the amplified sounds of a hearing aid. Also, many patients with conductive hearing loss respond to other treatment. The advice to the patient concerning need for referral requires direct examination of the ear in addition to the evaluation of hearing. Obvious obstructions to the external auditory canal by cerumen should be removed. Infections causing occlusion of the canal should be treated by thorough cleansing of the canal and by local and systemic administration of antibiotics. When the tympanic membrane is intact, changes in color or position may give a clue to middle-ear effusion, purulent or nonpurulent. Hearing is improved when the fluid is eliminated by spontaneous resolution of the disorder, by treatment of associated infections with appropriate antibiotics, or by direct removal of the fluid. Unilateral middle-ear effusion in the adult raises the question of nasopharyngeal tumor.

Conductive loss in the presence of an intact and normal-appearing tympanic membrane suggests a diagnosis of otosclerosis. This is correctable by surgical treatment in a high percentage of cases.

Conductive loss associated with a perforated tympanic membrane indicates damage to the conducting system of the ear. The perforation itself reduces the efficiency of the ear and can account for small degrees of hearing loss. Greater hearing losses suggest interference with the chain of ossicles. These conditions are potentially correctable by surgical means, although the percentage of success is not as great as with otosclerosis. Referral to an otologist for evaluation of the prospects for successful treatment is justified.

I have purposely avoided discussion of sophisticated equipment for testing hearing in the office of the non-otolaryngologist. Audiologic testing is not a simple procedure, and regardless of the equipment available, the test is subject to error. Errors due to faulty calibration of the equipment or excessive noise in the testing environment are predictable. Errors based on the skill of the examiner are not predictable and may vary widely from test to test with the same examiner and equipment. The more sophisticated the test and equipment the greater the skill required for competent performance. The simplest test, the air-conduction threshold, is least subject to error. The addition of only one factor, bone conduction, multplies the chances for error many fold. Any physician contemplating the use of an audiometer in his office should designate one employee to do the testing. It is best that this employee go to an audiology center for instruction in the basic techniques of pure-tone audiometry.

SUMMARY AND CONCLUSION

Hearing evaluation in the office of the generalist, pediatrician, internist, or other physician not primarily interested in otolaryngology is a practical procedure. Valuable information can be obtained by history and by examination. Simple tests, such as use of the voice and watch tick, are subject to great error and their usefulness is limited. A simple pure-tone air-conduction audiometer plus tuning forks provides the most useful and reliable means of evaluation. The technical problems in performing and evaluating sophisticated hearing tests make these impractical except for the office doing a large volume of hearing testing. □

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OSMA JOURNAL/special

Career Opportunities in the Health Sciences

Program Director:
JOSEPH J. FERRETTI, Ph.D.
Department of Microbiology and Immunology

COHS—a program aimed at acquainting high school students of racial minorities with health science research and the variety of career opportunities available in health care areas.

IT IS EVIDENT that racial minorities in our society, for a variety of reasons, have not had access to the career opportunities available to the white majority. This is true in most areas of endeavor and includes the health sciences. Those of us working in the health sciences have a responsibility to remove this inequity in our area. This past year we have had an opportunity to begin to correct this disparity by initiating the Career Opportunities in the Health Sciences (COHS) program. It was designed to expose young people of racial minorities to the atmosphere of medical research and to the variety of talents and disciplines that are encompassed in the health sciences. The results of the first summer indicate that we have been successful in arousing considerable interest in health science careers.

The program involved bringing high school students from the Oklahoma City area into laboratories in the University of Oklahoma Medical Center to work for ten weeks during the summer. They were each awarded a $500 fellowship, for which $2,500 was provided by donations from the Medical Center staff and $500 was provided by the Dean McGee Foundation. The students worked under the direction of professors of the Medical School who determined the type of activities in which they were involved. In all cases a one/on/one situation prevailed in which the research advisor worked quite closely with the student and provided an important source of stimulation. The COHS students also worked closely with medical and graduate students who also offered stimulation, but more importantly conveyed their feelings and experiences about the medical profession, medical school, and the rewards and difficulties these involve.

Each Wednesday at noon the COHS students met for an informal discussion or a seminar with a guest speaker who discussed some aspect of the health sciences. Each Friday a tour of one of the many facilities at the Medical Center was held. These were conducted by persons from the field under consideration who also explained the particular career opportunities available in their areas. The tours and discussions were all well received by the students as indi-

cated by several criteria, one of which was a comprehensive questionnaire answered by all of the students at the conclusion of the program. The input of the COHS students in this questionnaire will be discussed in one of the following sections.

SELECTION OF STUDENTS

Selection of suitable COHS students was based on a number of criteria. Applicants must have attained an average of B or above in mathematics and science; they must have indicated an interest in the program by writing a letter of application. Finally, a personal interview was requested of all the 21 applicants. The selection committee consisted of three professors from the School of Medicine, and two medical students. As it turned out, the personal interview was one of the most important parts of the selection procedure. A fifteen minute interview served to determine the student's motivations, expression, and awareness or lack of awareness of career opportunities available in the health sciences; his interest in science and medicine, and his family situation and financial need. The committee felt that 12 of the 21 applicants had sufficient promise and potential to go on to medical, dental or graduate school; however, funds available would support only six students. Since one of our main objectives was to interest minority group students in Medicine and the health related sciences, the program was not limited to students from hard-core poverty families. However, financial need was one of our considerations and the six students selected were all from low to low average income families. Two other students who were not from financially needy families were offered positions at the Medical Center without pay. They both were excellent students and it was our wish to further stimulate their interest in medicine and the University of Oklahoma Medical School. One of these students accepted our offer and worked the entire summer in the COHS program. Of the seven students participating in the program, one was an American Indian and the other six were black.

CAREER OPPORTUNITIES IN THE HEALTH SCIENCES

The following is a list of the students participating in the 1970 program, their high school of origin, and their Medical Center preceptor:

Student	High School	Medical Center Preceptor
Kerry Cox	Bishop McGuinness	Dr. Leon Unger Dept. of Biochemistry
Orville Herd	Douglass	Dr. Leonard Miller Dept. of Pathology
Vicki Lampley	Bishop McGuinness	Dr. Robert Delaney Dept. of Biochemistry
Carolyn Moles	Capitol Hill	Dr. Gilbert Castro Dept. of Laboratory Practice
Gerald Noble	Northeast	Dr. Roger Thies Mr. Larry Cowden Dept. of Physiology
Jackie Smith	Douglass	Dr. Mary Carpenter Dept. of Biochemistry
Karen Thigpen	Star Spencer	Dr. Joseph Ferretti Dept. of Microbiology

Kerry Cox and Karen Thigpen were both involved in bacterial genetics research. Orville Herd aided in experiments on hemophiliac dogs as well as experiments in protein synthesis. Vicki Lampley worked on various methods of determining abnormal immunoglobulin levels in blood. Carolyn Moles worked on a project involving chemical analysis of materials released by intestinal parasites. Gerald Noble constructed specially designed electronic equipment for biophysical experiments. Jackie Smith determined the distribution of protein in testes of rats fed normal and Vitamin C deficient diets.

1970 PROGRAM

The program of tours and movies presented last summer is listed below. In each instance the breadth and career opportunities available in a particular field were brought out by the discussion leader; e.g., during the surgery tour, mention was made of the anesthetist, the surgical technician, specialized nurses in the recovery room and intensive care unit, and interns and residents; during the dental school discussion, mention was made not only of the dentists, but also dental hygienists, dental aides, dental technicians; etc.

June	10	Welcome address, Doctor John P. Colmore, Associate Dean, School of Medicine. Health Career Slide Program.
	12	Oklahoma Medical Research Foundation Tour, Doctor Robert Delaney, Associate Professor of Biochemistry.
	17	Film: Medical + Biochemical Genetics.
	19	Hospital Administration Seminar and Tour of University Hospital Wards and Emergency Room, Mr. C. Edward Schwartz, Assistant Hospital Administrator.
	24	Film: Hemo The Magnificent.
	26	Surgery and Intensive Care Unit Tour, Veterans Administration Hospital, Dr. Lazar Greenfield, Chief of Surgery.
July	1	Viet Nam Slide Program, Doctor Yezid Gutierrez and Doctor Gilbert Castro, Department of Laboratory Practice.
	8	Hemodialysis Unit Tour, Veterans Administration Hospital, Doctor Billy Matter.
	10	Anesthesiology Tour, Children's Memorial Hospital, Doctor Bertram Sears, Inhalation Therapy, University Hospitals, Mr. John Hubbard.
	15	Social Work Seminar, University Hospitals, Miss Katherine Horner, Director of Department of Social Work.
	17	History of Science Library Tour, University of Oklahoma, Norman, Doctor Wilson, Assistant Professor of History of Science Department.
	20	Film: Gateways to the Mind.
	24	Psychiatry Seminar, University Hospitals, Doctor Gordon Deckert, Chairman, Department of Psychiatry.
	31	Pediatrics Tour, Children's Hospital, Doctor Xavier Allue, Department of Pediatrics.
Aug.	5	Radiology Tour, University Hospitals, Doctor Gail Adams, Chief, Radiation Physics.
	7	Medicine Clinics Tour, University Hospitals, Doctor John Townsend, Director, Health Service.
	12	Dental School Seminar, Doctor Robert Hansen, Associate Dean, School of Dentistry; Mr. R. H. Sullens, Associate Dean of Planning, School of Dentistry.

Informal discussions also were held frequently and covered the following topics: The cost of medical education; requirements for admission to medical, dental, graduate schools and the other areas of health profession; the time involved in various stages of education, *e.g.*, medical school, internship, residency and post-doctoral programs. Other areas discussed which were not in the tours included nursing, public health, dietetics, laboratory technology, speech therapy, occupational therapy, and physical therapy.

The cooperation provided by the various departments and individuals in the Medical Center in arranging tours and providing leadership for this program was uniformly excellent. Both the tours and informal discussions were met with a great deal of enthusiasm by the students. Moreover, they seemed appreciative of the efforts that were being expended on their behalf.

RESPONSE OF STUDENTS

At the conclusion of the summer an extensive questionnaire was given to the students in order to determine their reactions to the program. A sampling of the responses is as follows:

In each instance the students felt that participation in the COHS program would influence their choice of a career. Four expressed a desire to go to medical school and three were undecided, though definitely interested in a health career.

The aspects of the program they liked best ranged from the tours and discussions to being able to work on their own in the laboratory. There were no major aspects of the program that they disliked.

To improve the program or make it more effective they would like to have more informal discussions with the group.

The students generally found out about the program through their science teachers. They suggested that more advertising in local and school newspapers and on television might help make the program known to more students. In each instance the students replied in the affirmative when asked if they would be willing to help recruit prospective candidates for the program next year.

Joseph J. Ferretti, Ph.D., received his doctorate degree from the University of Minnesota in 1967 and is presently Assistant Professor of Microbiology and Immunology at the University of Oklahoma Medical Center. His specialty is biochemical genetics. Doctor Ferretti's medical affiliations include the American Society for Microbiology, and the American Association for the Advancement of Science.

All of the students did a certain amount of outside reading in connection with their work in the laboratory and with regard to medical education.

Six of the seven students expressed a desire to return to the Medical Center to work in a laboratory again next year. The student that answered in the negative did so because she thought she would be depriving another student of a "once in a lifetime experience."

The remainder of the questionnaire was a rating of the tours and discussions we had last year along with their suggestions of other areas which could be included in next year's program. Finally, each wrote a summary of the research work in which he was involved during the summer.

RESPONSE OF FACULTY

The response of the professors in charge of the students was very encouraging. They were impressed with the capability of the students to carry out relatively sophisticated laboratory procedures and in their eagerness to involve themselves in the research projects.

Two professors who have previously had gifted high school students working in their laboratory noted that the COHS students were initially slower and required more input. However, the fact that they were able to operate at comparable levels with the other students during the final stages of the program indicated that not only could a substantial amount of progress be made in the development of the student, but that it was accomplished because the student had the opportunity to demonstrate his capabilities.

RECOMMENDATIONS AND SUMMARY

The success of last year's program suggests that it be continued and expanded for the summer of 1971. It is intended to recruit students not only from the Oklahoma City area, but from throughout the state. The number of new students accepted in the program should be increased to twelve. Although we cannot predict whether the present students have been influenced strongly enough to attain a health career, we do know that they express a desire in this direction and it is our intent to reinforce this initial impression by contact through the year and by offering them another summer fellowship in 1971. This would bring the total number of students in the program to nineteen. Particular emphasis in this year's recruitment will be in obtaining more applications from Indian students.

It is intended that more informal intragroup discussions be included in the program this year as suggested by the students. In addition, a more formalized lecture series will be presented to instruct the students in the basic sciences as taught in the Medical Center. Emphasis also will be placed on increasing communication skills, both written and oral. Contact will be made with other universities conducting similar programs to obtain advice and suggestions for a more effective program.

An important factor in the success of last year's program was that we were able to offer the students a $500 fellowship. In this way students who would otherwise have had to seek outside employment to earn money for the upcoming school year were able to participate in the program. The total amount of $3,000 necessary for fellowships was difficult for the Medical Center to obtain. We were, however, able to match and surpass this with an equivalent of $8-10,000. from professors who volunteered the use of their talent, time, space, and equipment. We intend to apply to the Office of Economic Opportunity and other interested groups for funding this year.

In summary, the 1970 COHS program was a remarkably successful and rewarding experience for both the summer students and the program personnel. We intend to continue our efforts to extend the opportunities of health science careers to young people of racial minorities.

ACKNOWLEDGMENT

It is a pleasure to acknowledge the encouragement and assistance of the late Doctor John P. Colmore, Interim Executive Vice-President, in making the 1970 COHS Program a reality. The generous assistance

of Doctor L. V. Scott and the secretarial staff of the Department of Microbiology and Immunology is especially appreciated.

The 1970 COHS Program was modeled after a similar program started at the University of Minnesota the previous year by Doctor Ernest D. Gray, Associate Professor of Biochemistry and Pediatrics. We at the University of Oklahoma Medical Center express our deep appreciation to Doctor Gray for his communications, advice and suggestions. □

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Special note: Oral contraceptives have been marketed in the United States since 1960. Reported pregnancy rates vary from product to product. The effectiveness of the sequential products appears to be somewhat lower than that of the combination products. Both types provide almost completely effective contraception.

An increased risk of thromboembolic disease associated with the use of hormonal contraceptives has now been shown in studies conducted in both Great Britain and the United States. Other risks, such as those of elevated blood pressure, liver disease and reduced tolerance to carbohydrates, have not been quantitated with precision.

Long-term administration of both natural and synthetic estrogens in subprimate animal species in multiples of the human dose increases the frequency of some animal carcinomas. These data cannot be transposed directly to man. The possible carcinogenicity due to the estrogens can be neither affirmed nor refuted at this time. Close clinical surveillance of all women taking oral contraceptives must be continued.

Indication – Demulen is indicated for oral contraception.

Contraindications – Patients with thrombophlebitis, thromboembolic disorders, cerebral apoplexy or a past history of these conditions, markedly impaired liver function, known or suspected carcinoma of the breast, known or suspected estrogen-dependent neoplasia and undiagnosed abnormal genital bleeding.

Warnings – The physician should be alert to the earliest manifestations of thrombotic disorders (thrombophlebitis, cerebrovascular disorders, pulmonary embolism and retinal thrombosis). Should any of these occur or be suspected the drug should be discontinued immediately.

Retrospective studies of morbidity and mortality conducted in Great Britain and studies of morbidity in the United States have shown a statistically significant association between thrombophlebitis, pulmonary embolism, and cerebral thrombosis and embolism and the use of oral contraceptives. There have been three principal studies in Britain [1-3] leading to this conclusion, and one[4] in this country. The estimate of the relative risk of thromboembolism in the study by Vessey and Doll[3] was about sevenfold, while Sartwell and associates[4] in the United States found a relative risk of 4.4, meaning that the users are several times as likely to undergo thromboembolic disease without evident cause as nonusers. The American study also indicated that the risk did not persist after discontinuation of administration, and that it was not enhanced by long-continued administration. The American study was not designed to evaluate a difference between products. However, the study suggested that there might be an increased risk of thromboembolic disease in users of sequential products. This risk cannot be quantitated, and further studies to confirm this finding are desirable.

Discontinue medication pending examination if there is sudden partial or complete loss of vision, or if there is a sudden onset of proptosis, diplopia or migraine. If examination reveals papilledema or retinal vascular lesions medication should be withdrawn.

Since the safety of Demulen in pregnancy has not been demonstrated, it is recommended that for any patient who has missed two consecutive periods pregnancy should be ruled out before continuing the contraceptive regimen. If the patient has not adhered to the prescribed schedule the possibility of pregnancy should be considered at the time of the first missed period.

A small fraction of the hormonal agents in oral contraceptives has been identified in the milk of mothers receiving these drugs. The long-range effect to the nursing infant cannot be determined at this time.

Precautions – The pretreatment and periodic physical examinations should include special reference to the breasts and pelvic organs, including a Papanicolaou smear, since estrogens have been known to produce tumors, some of them malignant, in five species of subprimate animals. Endocrine and possibly liver function tests may be affected by treatment with Demulen. Therefore, if such tests are abnormal in a patient taking Demulen, it is recommended that they be repeated after the drug has been withdrawn for two months. Under the influence of progestogen-estrogen preparations preexisting uterine fibromyomas may increase in size. Because these agents may cause some degree of fluid retention, conditions which might be influenced by this factor, such as epilepsy, migraine, asthma, cardiac or renal dysfunction, require careful observation. In breakthrough bleeding, and in all cases of irregular bleeding per vaginam, nonfunctional causes should be borne in mind. In undiagnosed bleeding per vaginam adequate diagnostic measures are indicated. Patients with a history of psychic depression should be carefully observed and the drug discontinued if the depression recurs to a serious degree. Any possible influence of prolonged Demulen therapy on pituitary, ovarian, adrenal, hepatic or uterine function awaits further study. A decrease in glucose tolerance has been observed in a significant percentage of patients on oral contraceptives. The mechanism of this decrease is obscure. For this reason, diabetic patients should be carefully observed while receiving Demulen therapy. The age of the patient constitutes no absolute limiting factor, although treatment with Demulen may mask the onset of the climacteric. The pathologist should be advised of Demulen therapy when relevant specimens are submitted. Susceptible women may experience an increase in blood pressure following administration of contraceptive steroids.

Adverse reactions observed in patients receiving oral contraceptives – A statistically significant association has been demonstrated between use of oral contraceptives and the following serious adverse reactions: thrombophlebitis, pulmonary embolism and cerebral thrombosis.

Although available evidence is suggestive of an association, such a relationship has been neither confirmed nor refuted for the following serious adverse reactions: neuro-ocular lesions, e.g., retinal thrombosis and optic neuritis.

The following adverse reactions are known to occur in patients receiving oral contraceptives: nausea, vomiting, gastrointestinal symptoms (such as abdominal cramps and bloating), breakthrough bleeding, spotting, change in menstrual flow, amenorrhea during and after treatment, edema, chloasma or melasma, breast changes (tenderness, enlargement and secretion), change in weight (increase or decrease), changes in cervical erosion and cervical secretions, suppression of lactation when given immediately post partum, cholestatic jaundice, migraine, rash (allergic), rise in blood pressure in susceptible individuals and mental depression.

Although the following adverse reactions have been reported in users of oral contraceptives, an association has been neither confirmed nor refuted; anovulation post treatment, premenstrual-like syndrome, changes in libido, changes in appetite, cystitis-like syndrome, headache, nervousness, dizziness, fatigue, backache, hirsutism, loss of scalp hair, erythema multiforme, erythema nodosum, hemorrhagic eruption and itching.

The following laboratory results may be altered by the use of oral contraceptives: hepatic function: increased sulfobromophthalein retention and other tests; coagulation tests: increase in prothrombin, Factors VII, VIII, IX and X; thyroid function: increase in PBI and butanol extractable protein bound iodine, and decrease in T^3 uptake values; metyrapone test and pregnanediol determination.

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The Oklahoma Medical Examiner System: Recommendations For The Future

JAMES L. LUKE, M.D.

A review of needs, in terms of the public health and safety, the present deficits and the very real potential of the Medical Examiners Office are presented.

ADEQUATE EVALUATION of sudden death, whether it be associated with violence or whether it be presumed to have eventuated from natural causes cannot be effected without specialized training. The sophistication with which a particular death is investigated depends entirely on the qualifications of the investigator. Answers will be given for every query. But are they the correct ones?

Was the deceased shot from the back or from the front? How many times was he shot? Can the answers to these questions be determined from the wounds identified? What can be said—and what cannot be said —about the muzzle-to-skin distance? Do these *facts* correspond to the witnesses' description of the circumstances of the fatality? Facts don't lie.

Can the coronary disease noted at autopsy be said to be the *cause* of the automobile fatality in question or is it but an anatomic *finding?* Are the injuries noted on the victim pulled from the vehicle the cause of the victim's death or were they inflicted post-mortem? The validity of the answer depends on the training and experience of the one who is making the determination.

Did the elderly woman found dead in bed really die from cerebro-vascular insufficiency or might she have died of carbon monoxide poisoning? Was the carboxyhemoglobin determination performed on her blood accurate? And the determination for barbiturates? Were it even done, and if so, by whom? And other drugs? Was she smothered? Did she perhaps die of an acute subdural hemorrhage? Should she be autopsied, and by whom?

The possibilities in *every* case handled by any medical-legal agency are truly infinite. No such death is accurately labelled at the time it is reported. But which cases are to be reported? And how are they to be handled, and by whom?

These are not vacant questions. They and many others like them involve the very fab-

ric of our society and touch on the values which we hold most precious—justice, freedom, the public health, and law and order.

As Professor William Curran of the Harvard School of Public Health has stated so eloquently,[1] "In the United States today, medicolegal investigation of deaths is poorly handled in well over 60 percent of American legal jurisdictions." (The figure is actually in excess of 90 percent.) "Part of the shame, the scandal, of this condition lies in the fact that it has existed for so long. It has improved but little during this entire century. Yet long standing problems tend not to be remedied for that very reason: They have been around for so long that officialdom and the man in the street alike see no pressing need to cope with them."

Over the past decade alone violent death has increased 104 percent in the United States, with most of that increase having occurred during the past five years. And the rate is accelerating.

The abuse of drugs has reached epidemic proportions in this country. Heroin addiction is currently *the leading cause of death* below the age of 35 years in New York City. Ingestion and/or injection of drugs demands the availability of proper laboratory facilities to elucidate the spectrum of the drug problem in the aggregate, and to identify the particular drug or drugs which may have caused death in a given case. The victim cannot supply this information, and he often has only hearsay information as to the chemical composition of the drug which he has been given or sold. Was his heroin spiked with strychnine? Was what he injected really Methedrine? Did the particular drug recovered from his tissues actually cause his death? Were distribution studies performed on drug levels from various of his tissues to determine time of ingestion?

These also are not vacant questions.

Can we in this country afford Warren Commissions to conduct *ad hoc* reviews of every political assassination? Can we prepare ourselves in Oklahoma to prevent this from occurring here?

Equally as important, what can we *learn* about these "accidents of nature"—which cannot be duplicated in the laboratory—to prevent them in the future?

These are real people, our sons and daughters, our wives and parents. Is it more important to fund live television coverage of a manned lunar landing or to begin to deal effectively with problems of the type itemized above, which affect us personally and deeply and on a daily basis here on earth? And there are many more examples than I have mentioned. It is strictly a matter of priorities, on a national scale, and it is no less in Oklahoma.

It has been well demonstrated that any medical-legal jurisdiction should investigate some one-third of the total deaths within its borders and should conduct autopsy examinations on approximately one-third of *these* cases to accurately evaluate the cause and circumstances surrounding those deaths. But which deaths are to be selected for investigation, and by whom? And which of the selected cases will be autopsied, and by whom? Oklahoma is less than 50 percent effective on both counts.

Obviously no two cases are alike. The individual with multiple millions of dollars of life insurance is different, by definition, from the derelict found in the street. The shooting victim found dead in his home by his wife is a different sort of case than the witnessed barroom shooting victim. The child brought dead to the Emergency Room by his parents with multiple "accidental" injuries is different from the infant found dead in his crib. Each case must be handled on the merits of that particular case. The fact that some are more complicated than others and the fact that some are more "important" than others is simply a fact of life. Methods must be developed and implemented in Oklahoma such that a rational determination can be made as to which case is to be handled by which investigator and pathologist, to attempt to match cases of the greatest complexity or significance with individuals with the greatest experience.

At present, in Oklahoma there is no means by which effective case selection can be accomplished. We have no communications capability to enable us to rationally control the disposition of any of our cases, by defi-

nition *the most critical facet* of the entire operation of any Medical Examiner System. The majority of the cases which legally fall under our jurisdiction are not even reported to the Office. Twenty percent of known homicides and suicides and 85 percent of vehicular fatalities — death certificates on file at the State Department of Health—are not reported to or investigated by the Office. What about the subtle cases? I can count those cases which have been handled adequately by us, not to mention optimally, over the past four years on the fingers of one hand. What we have in Oklahoma, by definition *and by default*, is a Coroner System which is called something else. The intent in creating a Medical Examiner System in 1962 was excellent and farsighted, but its implementation has left much to be desired.

The Oklahoma Medical Examiner System, created by statute, has never been implemented. How could it possibly have been? Ours is still—four years into a professionally directed program—a one man/one secretary agency, which says it all.

Ours is the most poorly staffed and funded medical-legal agency of its size in the world, and by orders of magnitude. Laboratory facilities are grossly inadequate in every respect. Most laboratory services essential to the adequate handling of our cases are not available to us at all. If we had the requisite laboratory equipment, there would be no place to put it or the needed additional personnel. Our pathology facilities are rudimentary at best.

As the Oklahoma Medical Examiner System is presently structured, the press of multiple conflicting responsibilities has served to thoroughly sap and prorate the time and energies of the State Medical Examiner, who serves as the agency's only administrator, lobbyist, lecturer/teacher, public relations man, answering service, and accountant, among myriad additional duties. He is also the agency's principal forensic pathologist, titularly and in terms of numbers of cases handled, and personally performs upwards of 300 medical-legal autopsies per year, representing nearly all of the cases which emanate from central Oklahoma and all of those from Oklahoma County.

Because of the severe funding restrictions imposed on the Office in 1967 (with a total operating budget of $100,000), the decision was made—again by default—to personally handle the medical-legal autopsies performed on cases from the central part of the state, thereby to allow full reimbursement for medical-legal autopsies performed by private pathologists elsewhere. Unfortunately this practice has been allowed to continue. As a result, the Office has become so deluged with routine cases (mainly from Oklahoma County, many of which could well have been handled with supervision by local pathologists) that insufficient time has remained for the Office to investigate those complex cases from elsewhere in the State that only an experienced forensic pathologist, by training, could adequately handle.

In addition, and because of the press of the conflicting responsibilities alluded to above, little time has remained to educate those actively involved in the program around the State (County Medical Examiners and pathologists, law enforcement personnel and District Attorneys, etc.), to the rationale for the program and to the specifics of the very complex art of this specialty. This is the second critical deficit and the only way the System could ever possibly be upgraded.

There has been virtually no active support of the program, even by those most intimately involved with it. The Medical Examiner's Office has served largely as a convenience to law enforcement, as a work saving device for them and as a vehicle for "getting autopsies performed" when, in their wisdom, an autopsy is required. But the autopsy often fails to illuminate the circumstances of a given death in and of itself.

A 1960 graduate of Western Reserve University School of Medicine, James L. Luke, M.D., has been certified by the American Board of Pathology. He is presently Professor of Forensic Pathology at the University of Oklahoma School of Medicine. Doctor Luke is affiliated with the American Association of Pathologists and Bacteriologists and is a Fellow of the American Academy of Forensic Sciences.

Ancillary police investigation is often required in this regard and often before the autopsy has been completed. Yet it is the rule and not the exception that such investigations are not commenced until the finalized autopsy report finds its way to the law enforcement community. Depending on the complexity of the case, from the point of view of pathology, this process may take days or weeks following the fatality. But such naive behavior can only be said to be symptomatic of the present gross lack of understanding of the rationale of a medical-legal agency and its relationship to law enforcement. The answer lies in education.

How interested really are we in law and order in Oklahoma? While more bullets and the more effective revolving lights may solve minor law enforcement needs in the short term, surely they are not a realistic solution to the needs of the *public* in terms of law and order. There have been, for instance, some 20 to 30 extremely complicated homicides committed in Oklahoma over the past four years. Yet nearly all are still unresolved. It would seem perfectly apparent that increased professionalism, in terms of available sophisticated technology, might have led to the resolution of some of these difficult cases. One would think that the role played by a more functional medical examiner's office (i.e., forensic pathology, trace-evidence acquisition, toxicology and serology) might have been encouraged and actively supported by the law enforcement community. Yet requests submitted over the past two years for funding from the four million-plus dollar Department of Justice (LEAA) grant allocated to the State Crime Commission, have failed to receive favorable consideration. Such funds would have allowed for increases in laboratory facilities, communications and personnel.

How interested are we in drug abuse when the only way to understand the dimensions of that accelerating problem is by sophisticated chemical screening techniques? No such laboratories are available to the people of this State—for the living or for the dead. The Medical Examiner's Office currently is forced to certify some 200 deaths per year, which are probably drug related, as "undetermined cause of death, undetermined circumstances"—again by default.

It would seem that the cry for law and order and drug abuse control are largely political rhetoric in Oklahoma.

The same general lack of support can be said to have been manifested on the part of the legal community, defense and prosecution alike, and for similar reasons. For instance, medical-legal evidence is specifically excluded, by statute, from being introduced in civil litigation, a legal quirk unique to Oklahoma which flies in the face of the public interest. The vast majority of the litigation which eventuates from medical-legal case material involves civil actions. Less than five percent of our cases are in any way related to criminality and very few of these cases come to trial. While the genesis of this particular section of the statutes can easily be surmised, this particular facet of the law would seem eminently unfair and unjust. Is the public that finances the investigation of civil cases of medical-legal significance to continue not to have the benefit of the results of those investigations?

But it is not simply a matter of inadequate personnel, facilities, laboratories or funding (and all these restrictions were anticipated four years ago) though the job cannot possibly be done adequately without *all* of these items. What I did not anticipate is the fundamental lack of commitment and the grinding apathy on the part of those best able to effect change, to support this program. It is principally a matter of commitment.

* * *

Major changes in the structure of the Oklahoma Medical Examiner System will have to be effected if the needs of the citizens of the State are to be satisfied.

1. *Name of Governing Board.* The name of the governing Board, the Board of Unexplained Deaths, should be changed. There is nothing "unexplained" about our cases when the decision is made to report any given case. In fact the majority have indeed been explained, but erroneously. Homicides, suicides, accidental deaths and medically unattended deaths are medical exam-

iner cases by definition, whether unexplained or not—no matter where a particular death might occur, whether it be at home or in the hospital, for instance. Having created such a moniker as "Board of Unexplained Deaths" has confused, from time to time, most of those who relate to the Office—law enforcement officials, physicians (many of whom think only those cases are reportable to the Office that are unexplained or in some way mysterious), etc. A more accurate designation would be Board of Medical-Legal Investigations.

2. *Composition of Board.* The membership of the Board should be expanded. The present Board members are designated by Statute as the Dean of the University of Oklahoma School of Medicine, the Commissioner of the State Department of Health and the Director of the Oklahoma State Bureau of Investigation. Not only is each of these individuals exceedingly busy but each is a State agency head in his own right, and his primary responsibility correctly lies with his own agency. Consequently the current Board members, as agency heads, and the Board of Unexplained Deaths they represent are in literal competition for every nickel of legislative appropriation. The practical result of this unfortunate situation is that over the past four years the effectiveness of the Board has been significantly compromised and the desperate needs of the office have remained unsatisfied.

Ideally the Board should consist of individuals actively *interested* in the future of the Medical Examiner's Office. They should be appointed for overlapping terms and might well consist of members of the Oklahoma State Medical Association, the Oklahoma State Bar Association, the Oklahoma Society of Pathologists and the lay community, plus the current Board members. Proportionate representation from rural Oklahoma, Tulsa and Oklahoma City should be guaranteed.

3. *Funding.* The operating budget of the Office should be in the range of 20 to 30 cents per citizen per year, or upwards of $500,000, with the present Oklahoma population base, and consonant with other functional medical-legal jurisdictions. Supplemental funding for personnel and equipment and for training and education can certainly be made available through the State Crime Commission appropriation from LEAA and/or through similar LEAA discretionary funding, a mechanism which would serve to effectively *increase* the total LEAA appropriation to the State.

Without the minimal funding noted above, the Office will continue to be unable to complete its professional much less its legal responsibilities.

4. *Facilities.* Adequate physical space should be made available to or created for the Office so that its activities can be effected in an appropriate fashion. Most medical-legal jurisdictions of comparable size and scope have found that a facility of some 30,000 square feet is required to achieve this end, with approximately 10,000 square feet each allocated for office space, forensic pathology and for forensic laboratory services.

The facility/Office should continue to be physically and administratively associated with the University of Oklahoma Medical Center. Such an arrangement is mandatory for many and diverse reasons, which include the necessity to accomplish the educational responsibilities of the Office in the teaching of medical students, the post-doctoral training of residents in the Department of Pathology, the forensic pathology residency training program, the training of paramedical personnel, research, etc. Adequate space should be available within the facility for lectures, conferences and seminars.

The Office definitely should not become a part or sub-division of the Oklahoma State Department of Health. Where such an administrative compromise has been made elsewhere, and the Commonwealth of Virginia is the jurisdiction with the longest history in this regard, such an arrangement has proven quite unsatisfactory.[2]

Adequate communications capability must be an integral part of the agency. Every medical examiner case should be reported by telephone (by WATS line) directly to the Office, so that a rational informed decision can be made upon reception of a given case as to its disposition, *i.e.*, how that case will actually be handled, how it will be in-

vestigated, and by whom, whether it will be autopsied or not, and by whom, etc. Forms can be drafted for such information acquisition and clerical personnel can be trained to implement this most important function of the Office. In no other way will the Oklahoma Medical Examiner System be effective in terms of the protection of the public health and safety.

The facility should include identifiable space for external examination of bodies, autopsy facilities of at least two tables, histology, photography, x-ray and refrigerated storage space for at least 20 bodies. Forensic laboratory services should include adequate space for forensic toxicology (as noted above), serology, identification (forensic anthropology and odontology) and trace evidence examination, among other related laboratory activities.

5. *The University.* It would be extremely desirable and mutually advantageous to establish an Institute or Center of Forensic Medicine at the University of Oklahoma Medical Center. Such a proposal[3] already has been submitted and has received Medical Center approval in principle.

In the aggregate, the conditions which serve as the raw material for any medical-legal agency dwarf any other disease category, in terms of the combination of sheer numbers of cases, public relevance and interest and from the standpoint that the majority of the victims are entirely healthy and in the prime of their lives. Very little academic attention has been paid and practically no organized effort has been made in this country to attempt to develop concerted insight into the causes and effects of such aberrant behavior and to develop understanding as to the motivation involved and the anatomic and chemical dynamics of these "accidents of nature." Unlike the massive basic research commitment necessary to the understanding and control of atherosclerosis or cancer, these problems are resolvable now and by available methods, were it possible to study them in an organized intellectual atmosphere. Such understanding is clearly required before even the formulation of sound public policy can be promulgated in the fields of health care delivery and criminal justice. The one thing that can be stated for certain is that no further understanding will be forthcoming if an attempt is not made to do so by the academic community.

It would seem that the University of Oklahoma itself must make a commitment to this broad concept for it to have any real chance of succeeding. Active interdigitation between the Medical Center, the Schools of Law and Engineering and the various departments of the behavioral sciences, among other academic disciplines would be exceedingly productive. Such problem-oriented (in contrast to discipline-oriented) pursuits would bring together in a truly synergistic relationship individuals already engaged in forensic activities within the University but presently isolated, not only from the case material but also from their colleagues.

The possibilities for an interdisciplinary program of this type are virtually unlimited, in terms of research and education and are detailed in the proposal.[3]

6. *The Law.* The last sentence of Section 949 of the Oklahoma Medical Examiner Statutes, which states that "No report, findings, testimony or other information of the State or County Medical Examiner or their assistants shall ever be admitted in evidence in any civil action in any court in this state," must be deleted or amended. Factual information acquired through the efforts of this Office must be made available to the public, in court, in civil actions. Experience in every other functional medical-legal jurisdiction has clearly shown the value of such information, not only in terms of approximating reality in such matters, but also in shortening or obviating entirely courtroom testimony. The savings in court costs and in attorney's fees to the citizens of Oklahoma would be significant, to the extent that they might well, by themselves, pay for the entire operation of the Medical Examiner System.

7. *Personnel.* It would seem perfectly obvious, given the multiple serious restrictions that have been so much a part of the Oklahoma Medical Examiner System (many of which have been cited above) that a

fully trained forensic pathologist cannot be utilized to any significant degree in Oklahoma as the system is currently structured. Given the enormous potential of the Office in terms of education, training and research, as projected (in Section 5 above), it would seem short-sighted indeed, to attempt at this time to merely recruit "a forensic pathologist" to serve as the State Medical Examiner. At a time when the need for qualified forensic pathologists is so great across the country, to spend one of some 30 of those actively involved in the specialty on a fulltime basis in this grossly restrictive fashion—where change is not even contemplated—would seem the height of folly. Under the present circumstances the state might attract an autopsy "technician," dazzled by the title of State Medical Examiner, who would be available to conduct postmortem examinations at the request of law enforcement, to rule out "foul play" as they might put it.

But such an individual would not be able to serve the needs of the public. While he might relieve the Oklahoma County pathologists of any responsibility in participation in the program he would be unable to serve adequately the much larger medical, legal and law enforcement community from elsewhere across the State. That part of the job is impossible at present.

In addition, given the restrictive nature of the present position, he would be unable to attract additional forensic pathologists to help in the completion of his responsibilities. At least two fulltime forensic pathologists are needed to achieve this end in a minimally realistic fashion.

8. *Comparison with Other Medical-Legal Systems.* It would seem highly desirable for the Governor to create a committee composed perhaps of State Legislators, the Board, and other interested individuals to independently evaluate Oklahoma's medical-legal requirements. The closest—and probably the best—reference point in this regard would certainly be Dallas, Texas.

The Dallas system was created in 1968. Its new facility on the grounds of the University of Texas Southwestern Medical School will be completed this fall.

From the viewpoint of professional personnel, budgetary support, laboratory services, physical facilities and the medical-legal investigative system itself, the Dallas program is optimal. In my opinion, a visit there by such a committee as I have proposed would be extremely productive in terms of planning the future course of the Oklahoma Medical Examiner System.

* * *

A program must be defined. Plans must be promulgated. Funding must be identified. Space must be found. It can be done. The choice and the options are very clear.

But most importantly a commitment must be made to learn from the mistakes and compromises of the past, to support this agency in a realistic fashion and thereby—*and only thereby*—to more closely approximate justice and the public safety for the citizens of this State. □

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Annual Meeting Well Attended

Nearly one-fourth of the OSMA's membership attended the association's annual meeting in Tulsa April 29th-May 1st. Education, entertainment and business occupied the time of those at the meeting.

Eight special scientific symposiums brought scores of physicians to the meeting hall. In addition, three special presentations, including Al Capp's talk, topped off the program. While going to and from the various meetings, physicians viewed sixty-nine scientific and technical exhibits.

During the annual President's In-



LUCIEN M. PASCUCCI

augural Dinner-Dance Saturday evening, Ed L. Calhoon, M.D., Beaver, bowed out as president of the association and handed over the reins to Lucien M. Pascucci, M.D., Tulsa radiologist. Doctor Pascucci's first official act was to present Doctor Calhoon with a plaque of appreciation for his year as president.

During the closing session of the OSMA House of Delegates Saturday morning, Oklahoma City cardiologist Stanley R. McCampbell, M.D., was chosen to serve as President-Elect of the association. He will assume the presidency during the association's 1972 meeting in Oklahoma City.

The Delegates chose Robert J. Hogue, Jr., M.D., of Guthrie, to serve as Doctor Pascucci's Vice-President and Haven W. Mankin, M.D., Oklahoma City radiologist, will serve as Secretary-Treasurer.

Outgoing President Calhoon was elected to a new position as Delegate to the AMA replacing Malcom Phelps, M.D., El Reno. Thomas C. Points, M.D., Oklahoma City, was re-elected to the position of Alternate Delegate.

Board of Trustees

The OSMA Board of Trustees held its annual meeting on Thursday morning, April 29th, to consider recommendations to the House of Delegates. C. Riley Strong, M.D., El Reno, was re-elected as Chairman of the Board for a period of one year, and Orange M. Welborn, M.D., Ada, was re-elected for a one-year term as Vice-Chairman.

MEET THE PRESIDENT

The OSMA's 66th President since its foundation in 1906 is Lucien M. Pascucci, M.D., a Tulsa radiologist. Doctor Pascucci has served as President-Elect during the past year.

In 1947 Doctor Pascucci joined the Tulsa County Medical Society and the OSMA. Throughout World War II he was in the U. S. Army Medical Corps. He graduated from Yale University School of Medicine in 1934, served his internship at New Haven General Hospital, New Haven, Connecticut and then served a three-year residency in radiology at Presbyterian Hospital in New York City.

Since 1947, Doctor Pascucci has been Director of the Department of Radiology at Tulsa's Saint John's Hospital. He has served on numerous committees and councils of the OSMA and the Tulsa County Medical Society.

House of Delegates

The complete proceedings of the House of Delegates will be printed in the June issue of *The Journal*. The following is a brief summary of the principal actions:

- Delegates rejected four resolutions calling for voluntary AMA membership.
- The House approved the creation of a non-profit corporation to administer the OSMA's Student Loan Fund. The new corporation will grant non-refundable loans to OU medical students who will sign contracts to serve a minimum of two years in medically needy areas. If a student defaults on the contract, the loan must be repaid.
- The Delegates approved a resolution providing that the OSMA go on record as favoring a state and federal law requiring that all prescriptions be labeled unless the prescribing physician stipulates "Do Not Label (DNL)."
- A resolution requesting that Blue Shield provide some method on its claim form whereby a physician may avoid participation in any of the Blue Plan UCR programs was approved by the House.
- The planning of a foundation for peer review in Oklahoma was authorized by the House. Purpose of such a foundation would be to implement any peer review law which may emanate from Congress. The planned organization of the foundation will be presented to a special called meeting of the House of Delegates for final ratification, amendment or rejection.
- The delegates recommended that medical students serve on the OU Medical School's Committee on Admissions in an advisory capacity only. Currently nine students serve as fulltime committee members.
- The House adopted a policy statement to the affect that the review of medical records regarding the appropriateness, medical necessity, quality of medical services, or the appropriateness of fees remains a peer review function to be performed only by physicians. Questionable situations may be referred to the OSMA Insurance Review Committee whenever indicated. □

Doctor Draft Resumes July 1st

Induction orders into the United States Armed Forces will be issued to 1,608 M.D.s and D.O.s and 5,036 dentists by July 1st of this year. The orders will call for a two-year active duty commitment.

The doctor draft was ordered resumed by the Department of Defense in February. The decision was necessitated by waning interest in the Berry Plan and inability of the armed services to retain former volunteers. Only 25 percent of military physicians are career officers.

The new draft orders call for 786 M.D.s and 41 D.O.s to go into the United States Army, 505 M.D.s and 26 D.O.s for the Navy, and 240 M.D.s and 10 D.O.s into the Air Force by the end of January, 1972. The Department of Defense warned last summer that renewal of the draft would be certain unless there was a sharp increase in volunteers under the Berry Plan.

The new draft affects physicians through age 34 who have not satisfied a prior military commitment and who are otherwise qualified. As per the new draft law, the youngest will be called first. The last draft call for physicians was issued in early 1969. □

Health Careers Conference Attracts 1300 Students

The third annual Conference for Health Careers was described as a "howling success" by the members of the Oklahoma Council for Health Careers. Over 1300 high school students from across the state attended the one-day conference.

The Health Careers Council is a statewide organization financed and sponsored by a number of state health related associations and organizations. The OSMA helped found the organization and has three members on its Board of Trustees. Mrs. Eleanor Johnson, a representative of the Oklahoma State Medical Association's Woman's Auxiliary is currently serving as President of the Health Careers Governing Board. Mrs. Johnson is the wife of Port E. Johnson, M.D., in the private practice of orthopedic surgery in Muskogee.

Dale Groom, M.D., Director of Oklahoma's Regional Medical Program, made the keynote charge to the conference in its opening session. He gave the students six tips for planning their health careers. First, he advised selection of a health career that would offer the security the student needed. Second, he told them to consider their own attitudes in what they think they can do best. Selection of a health career that was challenging and exciting was his third recommendation, and fourth was to look for a health career that offers variety, that keeps one mentally alert and alive. Personal satisfaction and a sense of achievement was the fifth tip, and finally he advised the conferees to select a health career that offers complexity and new frontiers to be explored.

The conference was held March 10th at Oklahoma City University. It actually began with registration and visits by the students to a number of "many" counseling booths manned by health professionals from several medical and paramedical fields. □

Railroaders' Claims Paid By Travelers

Retired railroad employees are covered on a nationwide basis by the Travelers Insurance Company. Many physicians in Oklahoma are submitting claims on these beneficiaries to the wrong carrier.

If a request for payment for a railroad worker is misdirected to either Aetna-Medicare or the Welfare Department, an appreciable delay in payment can result. Anyone needing to file such a claim for a retired railroad employee should submit such a request for payment to the Travelers Insurance Company, 135 Couch Drive, Oklahoma City, Oklahoma 73102. □

Medical Center Pushes Drive For Private Contributions

A campaign for private contributions to provide furnishings for rooms in the new University of Oklahoma Hospital is being pushed by the OU Medical Center Office of Research and Development.

Ten donations or pledges of $1,500 each have been made to date, Lee O. Teague, director of development, announced today.

"We must have funds for this and other purposes from the private sector if the concept of a great Oklahoma Health Center is to be realized," he said.

He described the center, with its teaching hospitals and five professional schools, training physicians, nurses and other health workers, as a "state supported" institution, noting that only about one-third of the Medical Center operational budget comes from state appropriation. The other sources are federal grants and individual contributions.

Construction of the first 215-bed unit of the new University Hospital is about 50 percent complete and the nine-level structure is expected to be opened in the summer of 1972.

The $11,959,000 project is financed with a federal grant and state bond monies.

Teague said a gift of $1,500 will furnish one patient room. A plaque with the name of the donor will be affixed to the door of each room furnished by private contributions.

"We desperately need more state funds for the operating budget of the medical center. At the same time, gifts from private individuals and organizations are needed not only to help furnish the new hospital but for treatment and diagnostic equipment, including radiology equipment urgently needed for treatment of cancer patients, and scholarship funds for future physicians and allied health personnel," he said.

The first $1,500 gift for complete furnishings of a patient room was made last month by Mr. and Mrs. T. Winston Eason, 7212 Waverly, Oklahoma City. □

Heart Association Plans Scientific Sessions

"Three Days on Arrhythmias" will be the topic for the annual Scientific Sessions of the Oklahoma Heart Association which will be held June 4th to 6th.

For the first time, the annual sessions have been expanded to a three-day period. The seminar features three outstanding visiting speakers in addition to several faculty members of the University of Oklahoma Medical Center.

Guest speakers include Doctor Henry J. L. Marriott, St. Petersburg, Florida, internationally known cardiologist and author; Doctor Richard Langendorf, Chicago cardiologist, and Doctor Anthony N. Damato, chief of research and cardiovascular program, U. S. Public Health Service Hospital, Staten Island, New York.

Sponsored by the Oklahoma Heart Association in cooperation with the Oklahoma Regional Medical Program, the sessions will be conducted at the new Basic Sciences Education building at the OU Medical Center.

Doctor Marriott, clinical professor of pediatric cardiology at the University of Florida and director of the coronary care center of St. Anthony Hospital in St. Petersburg, will present the Sooner address at the Heart Association luncheon at noon, June 5th, at Veterans Hospital. His topic will be "Coronary Milestones."

A Rhodes scholar, Doctor Marriott received his B.A., M.A., M.D. and B.Ch. from Oxford University. He served as house physician at St. Mary's Hospital, London. He was a resident medical officer to penicillin research unit at St. Mary's in addition to serving a residency at King Edward VIII Memorial Hospital, Bermuda. He was a fellow in medicine at Johns Hopkins University and hospital.

Formerly an associate professor of medicine at the University of Maryland School of Medicine, he is presently a member of the faculty of Emory University School of Medicine and director of clinical research at Rogers Heart Foundation, St. Petersburg.

The 1960 winner of the Wyeth Award for medical communication Doctor Marriott has authored home study courses in arrhythmias and bedside diagnosis of heart disease.

Doctor Langendorf, research associate at the Cardiovascular Institute of Michael Reese Hospital and Medical Center, is a native of Prague, Czechoslovakia. A graduate of the German University of Prague where he received his M.D. in 1932, he came to the United States in 1939 and became associated with Michael Reese Hospital at that time. He has been professorial lecturer in cardiology at the University of Chicago since 1965.

A prolific author, Doctor Langendorf's writings are mainly devoted to the interpretation of complex cardiac arrhythmias. In 1948, he introduced into clinical electrocardiography the concept of concealed conduction which has proved essential for the interpretation of many arrhythmias and recently was confirmed by direct recordings from the conduction system.

A fellow of the Council of Clinical Cardiology of the American Heart Association, Doctor Langendorf is also a fellow of the American College of Physicians and the American College of Cardiology. A member of numerous medical and scientific associations and societies.

Doctor Anthony Damato received his M.D. from Georgetown University in 1956. He completed an internship at D.C. General Hospital, Washington, D.C. He served a medical residency at Seton Hall College of Medicine, Jersey City, N.J. and was a fellow in cardiology at D.C. General Hospital. □

Tri-County Medical Society Honors Carlock



Pictured left, above, J. Hoyle Carlock, M.D., Ardmore, receives a plaque from Malcolm Horne, M.D., President of the Tri-County Medical Society, in recognition of his outstanding leadership as President-Elect of the Southern Medical Association, Past-President of the Oklahoma State Medical Association and the Tri-County Medical Society. Occasion for the presentation was a dinner meeting held at the Holiday Inn in Ardmore on March 9th, 1971. Doctor Carlock served as OSMA President in 1962-63. □



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Federal Grant Requested For OU Dental Building

The University of Oklahoma Medical Center has filed an application for a $7,799,333 federal grant for construction of a Dental Clinical Sciences Building, Leonard P. Eliel, M.D., OU Interim executive vice-president for medical center affairs, announced recently.

The requested money plus nearly $4 million from the 1968 state bond issue would be used to build an $11,769,000 structure designed as the home of Oklahoma's first School of Dentistry.

Doctor William E. Brown, dean of the developing OU dental school, said the Department of Health, Education, and Welfare sent a site visit committee to the Medical Center in April to review the grant application.

When the dental clinical sciences building is completed, hopefully in 1975, the school expects an enrollment of nearly 500 persons including future dentists in the four-year doctoral program, persons in advanced training to become dental specialists and teachers, hygienists, assistants and laboratory technicians, Doctor Brown said.

The first 24 students will be admitted to the School of Dentistry in the fall of 1972. Their first years of training will be in temporary facilities.

The projected Dental Clinical Sciences Building will be a key project in the Oklahoma Health Center, presently under construction in and around the University of Oklahoma Medical Center.

The five-level structure, with 112,901 square feet of floor space, will be located at the east edge of the Oklahoma Health Center between Kelley, Stonewall, NE 13 and NE 11 Streets, in close proximity to the new Student Basic Science Education Building and the proposed Health Sciences Library-Learning Resources Center and a Biomedical Science Building.

Preliminary drawings — by McCune-McCune and Associates, Tulsa architects and engineers—provide clinical operatories for patient care (teaching units simulating a dental office); lecture halls; supporting laboratories; oral diagnosis, radiology, pedodontic, and oral surgery clinics (including a general anesthesia operating suite with observation and recovery rooms); study carrels, seminar rooms and other student space, admitting facilities; and faculty and administrative offices.

The dental clinical sciences building application is the second filed by OU under the Health Professions Educational Assistance Program in order to build facilities for the School of Dentistry.

The first project, a $1,700,000 top floor dental addition to the Student Basic Science Education Building which opened in 1970, and has been approved pending availability of funds.

Planners are hopeful the basic science building addition will be funded and construction completed in time to accommodate the first or second class of students admitted to the dental school. In the interim, arrangements will be made for temporary facilities.

School of Dentistry headquarters now are at 636 NE 14, a converted residence where Dean Brown and a staff of four have their offices. They are at work on grant proposals, curriculum development, teaching materials, and faculty recruitment for the new school. The Oklahoma Dental Foundation, an arm of the Oklahoma Dental Association, has purchased the adjacent home which will provide temporary housing for the dental hygiene program and additional space for the dental school. □

Chiropractors In Michigan Blue Shield

Blue Shield of Michigan is now forced to pay for chiropractic services because of a new law. The law, known as the Chiropractic-Blue Shield bill, concludes a ten-year struggle by the Michigan State Chiropractic Association to get the services of its members covered.

Until now Blue Shield and the Michigan State Medical Society had successfully blocked the coverage of cultists services even though the cultists' patient might have been a Blue Shield subscriber.

The law passed the Michigan State Senate by a vote of 35, and went through the Michigan House of Representatives by a vote of 74 to 15. Michigan chiropractors hailed the passage of the bill as "a step forward in relations between chiropractors and the insurance field and between chiropractors and the medical profession."

Chiropractors are engaged in a nationwide scheme to force all insurance companies to pay for their services. They are introducing a so-called "insurance equality" bill into every state Legislatures. Such a bill is currently pending before the Oklahoma Legislature. The bills simply provide that the insured patient may choose whatever branch of the healing arts he wishes to diagnose and treat his difficulty and that his insurance company will pay for the treatment. □

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Physicians Over 70 AMA Dues Exempt

Physicians over 70 years of age are not required to pay dues to the American Medical Association in order to belong to that organization. Even though they are classified as regular members, they are dues exempt.

AMA membership rules state that physicians over 70 years of age may be exempted from payment of AMA dues by their state association. In this classification they are entitled to all rights and benefits of full AMA membership with the excepton that they shall not be entitled to receive any publication of the association except by subscription.

Regular membership in the AMA is limited to those members of the state association who hold a degree of doctor of medicine or bachelor of medicine, or who hold an unrestricted license to practice medicine and are entitled to exercise the rights of membership in their state association, including the right to vote and hold office, as determined by their state associations.

The AMA rules contain a number of reasons for the state associations to grant dues exemption to AMA members. These include financial hardship, illness, intern and resident training, retired from active practice, temporary service in the armed forces, or over 70 years of age. □

Physicians and Dentists Develop Workshop

Under the sponsorship of the Oklahoma Regional Medical Program, physicians and dentists from the University of Oklahoma Medical Center developed a traveling workshop on "Cancer of the Head, Neck, and Upper Respiratory Tract." The purpose of the workshop was to bring the latest available information on oral and upper respiratory tract cancer to Oklahoma physicians and dentists who cannot leave their practice for more than one day. The objective was to develop a capability for local physicians and dentists to detect oral and upper respiratory tract cancer at the earliest stage ,thus, increasing the patient's ability for survival.

The workshop was scheduled for programs in Enid, Ada, Bartlesville, and Lawton. The first workshop was held on February 19th, 1971 at the Holiday Inn, Enid, Oklahoma. Thirty-six physicians, dentists, and their auxiliaries from northwestern Oklahoma attended.

The curriculum was organized by Doctor Albert F. Staples, D.M.D., Ph.D., University of Oklahoma School of Dentistry. The faculty was composed of eminently qualified physicians and dentists from the University of Oklahoma Medical Center. □

Muscular Dystrophy Clinic Open in Tulsa

The Northeastern Oklahoma Chapter of Muscular Dystrophy Association of America has announced the opening of a clinic specializing in muscular dystrophy in Tulsa. Director for the new clinic will be Richard C. Gilmartin, M.D.

The new clinic will take muscular dystrophy referrals, or suspected cases, from anywhere in the state of Oklahoma. It will offer comprehensive examinations for differential diagnosis, including pertinent laboratory tests. Other services will include competent medical advice on special problems for patients with dystrophy and related diseases, physical therapy treatments, genetic counseling to families, and assistance with personal and family problems.

While the clinic's primary purpose will be to provide differential diagnosis and therapy, its existence offers the opportunity for studies which would be difficult to initiate without the availability of a large patient population.

The out-patient clinic is located in the Children's Medical Center, 4818 South Lewis, in Tulsa. □

Memorial Fund Established To Honor Maxwell Johnson

In recognition of Doctor Maxwell A. Johnson's contributions to medicine and to the community during his lifetime, a memorial scholarship fund has been created in his name. It will be administered by the Scholarship Fund of the Tulsa County Medical Society.

This scholarship will be given annually to a deserving and needy student of medicine, nursing or an allied medical science to assist in his education. Contributions are tax deductible. The family of Doctor Johnson will be advised of the name and address of each donor.

Doctor Johnson died February 23rd in Tulsa.

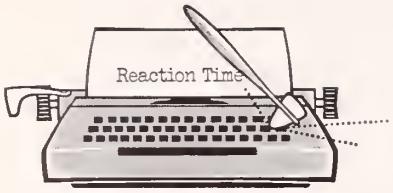
Doctor Johnson's lifetime of service to his patients and his community made him a beloved person. He was tireless in his professional, church and civic activities. He served as President of the Oklahoma State Medical Association and the Tulsa County Medical Society and in numerous other professional, hospital, and educational posts. He was one of the founders of the Doctors in Asia project for the First Presbyterian Church.

Persons wishing to contribute to the scholarship fund may send their checks to: Maxwell A. Johnson Memorial Scholarship Fund, Tulsa County Medical Society, 104 Utica Square Medical Center, Tulsa, Oklahoma 74114. Please make checks payable to: Scholarship Fund of the Tulsa County Medical Society. □

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Editor, Oklahoma State
Medical Journal
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Dear Sir:

Oklahoma physcians were recently "given a prescription for their ills" by the Stewart Wolf lecturer, Franz Ingelfinger, editor of a medical journal. Doctor Ingelfinger stated that doctors would function better in group and clinic practice rather than private practice. His principle reason was that more time would be available for study and research.

A number of fallacies come to mind in refutation of this current federal bureaucratic campaign to control medical care in our nation. To identify the pressures toward institutional practice it is to be recalled that the federal government has offered subsidies to "rich" physicians wishing to establish big clinics. Those functions the government wishes to control it subsidizes, or conversely, those private functions accepting public subsidies become federally controlled.

Those who are encouraging institutional practice are usually found to be persons who do not have a practice such as Doctor Inglefinger or non-physicians. We who are in active private practice (recently reported as 1931 out of 2185 physicians in the Oklahoma State Medical Association) and have also worked in group and government medicine are well aware of the fact that group and government medicine is much more expensive; is more time consuming and a less satisfying relationship between the physician and the patient; is less likely to encourage preventive medicine; is actually less conducive to postgraduate medical study; provides a narrower scope of consultations and cooperation and demands a more rigid schedule for its physicians.

Group and institutional practice embodies all of the difficiencies of any controlled cooperative enterprise, encouraging less individual responsibility on the part of its participants. The inanimate government, hospital or clinic becomes responsible to the patient and not the individual physician. The individual physician finds the protective mantle of the government or institution quite comforting and sheltering from many individual responsibilities. How far down the road of elimination of individual responsibility must we go before we realize the lethal end of the road experienced by countless nations of the past?

Very truly yours,

J. RAYMOND STACY, M.D.

JRS/nmu □

DEATHS

W. TOM JOHNSON, JR., M.D.
1921-1971

A 49-year-old Oklahoma City, general surgeon, W. Tom Johnson, M.D., died April 11th, 1971, in Oklahoma City. Born in Muskogee, Oklahoma, Doctor Johnson received his medical degree from the University of Oklahoma School of Medicine in 1954.

Doctor Johnson was a member of the Southwestern Surgical Society and the Oklahoma City Clinical Society.

EARL W. MABRY, M.D.
1882-1971

Earl W. Mabry, M.D., a long-time Altus physician, died in Clinton, March 26th, 1971. A pioneer physician of Jackson County, he was born in Gainsville, Tennessee and graduated from the University of Nashville Medical Department in 1907. His practice was established in Altus in 1923.

For over a half century of service to his profession and humanity, Doctor Mabray was presented a Fifty Year Pin from the OSMA in 1959 and in 1961 he became an Honorary-Life Member of the association.

STACY C. THOMPSON, M.D.
1889-1971

Retired Guthrie physician, Stacy C. Thompson, M.D., died March 3rd, 1971. Born in Kilgore, Texas in 1889, Doctor Thompson received his medical education from Meharry Medical College in Nashville, Tennessee. In 1920, he began his practice in Guthrie, Oklahoma. He was a member of the Oklahoma Public Health Association and the American Public Health Association.

HUGH B. O'NEIL, M.D.
1913-1971

A 57-year-old Vinita physician, Hugh B. O'Neil, M.D., died February 6th, 1971 in Vinita. He was graduated from Northwestern University School of Medicine in 1937. Following practice in Wisconsin, Colorado and Texas, Doctor O'Neil came to Vinita in 1962. Certified by the American Board of Internal Medicine, Doctor O'Neil was a member of the American Academy of Neurology. □

BOOK REVIEWS

TREATMENT OF INJURIES TO ATHLETES. By Don H. O'Donoghue, M.D. Cloth, 715 pp. W. B. Saunders & Co., Philadelphia. $23.80.

The second edition of "Treatment of Injuries to Athletes" is a revision of an already excellent medical book on a subject that has not had enough coverage.

Although this book discusses many specific injuries it is basic enough for any practitioner of medicine, seeing any type of athletic injury.

It begins with the general principles of treatment, as well as the prevention of athletic injuries to the individual player, including the involvement of his environment and his equipment. One part is devoted to general principles of treatment involving any part of the body, along with the proper time, place and manner of making an examination.

The majority of the book then deals with specific injuries to specific areas, with sections in all major portions of the body, including special chapters on the head and hand. Both minor and major injuries are covered in each specific area, after first discussing its anatomical consideration. *Marvin K. Margo, M.D.*

IMMUNOLOGY OF MALIGNANT DISEASE. By Jules E. Harris, Assistant Professor of Medicine, University of Ottawa, Ottawa, Canada and Joseph G. Sinkovics, M.D., Associate Professor of Medicine and Chief, Section of Clinical Virology and Immunology, University of Texas, M. D. Anderson Hospital, Houston, Texas. First edition. Cloth, 251 pp., St. Louis: The C. V. Mosby Company, 1970. $15.00.

During the previous decade, cancer therapy has been influenced by cellular kinetics. It would appear that, during the next decade, cancer therapy will be strongly influenced by tumor immunology. As such, *The Immunology of Malignant Disease* by Harris and Sinkovics is very timely and, fortunately, very up to date. This book is recommended to any reader who is relatively familiar with the terminology and concepts of immunology. It is a welcome review of immune reactions to malignant diseases. The chapter on experimental animal tumor immunology emphasizes viral-induced tumors. Harris' excellent chapter on the immune deficiency states associated with human malignant diseases is recommended to all clinicians caring for patients with Hodgkin's disease, multiple myeloma, or the leukemias. The book also includes a brief chapter on immuno-suppressive therapy.

There are few illustrations and little data are reviewed in depth. The authors have chosen to cite recent references which emphasize the current state of advancement in tumor immunology. As such, there is very little historical perspective in this review of immunology. The book has an extremely inadequate index, limiting its usefulness as a reference text. The authors and the publisher are to be congratulated for producing a book in September of 1970 that includes references published in April of 1970. *G. Bennett Humphrey, M.D.*

AMERICAN INDIAN MEDICINE, by Virgil J. Vogel. 583 pp., University of Oklahma Press. $12.50.

The author says that the purpose of his book is to show the effect of Indian medicinal practices on white civilization, but actually it does much more than that. It discusses Indian theories of disease and methods of combating disease, and even goes into the question of which diseases were indigenous and which were brought to the Indian by the white man. Of special interest to persons in the medical professions is the list of Indian drugs that have been accepted in the *Pharmacopeia of the United States* and the *National Formulary.*

THE STORY OF FRITZ HABER, by Morris Goran. 212 pp., University of Oklahoma Press. $5.95.

Winner of the Nobel Prize in chemistry for 1918, German chemist Fritz Haber was at the center of the scientific awakening during the early twentieth century. He helped to keep mankind from starving by his discovery of nitrogen fixation, and this contribution was vastly more significant for his time than the achievements of even Planck or Einstein. On the other hand, he was responsible for the development of the poison gas of World War I. His achievements did not keep the Nazis from persecuting him along with the rest of the German Jews and he was forced into exile. The fact remains that he was a great scientist, and this book is not only a biography but a record of his scientific methods and discoveries.

PIONEER DOCTOR, by Lewis J. Moorman. 252 pp., University of Oklahoma Press. $5.95.

Doctor Moorman was a pioneer doctor in more ways than one. Not only did he pioneer in Oklahoma Territory in 1901 (losing out in the Kiowa-Comanche land lotteries of 1901), but he also pioneered in the sanatorium method of treatment of tuberculosis. The latter earned him a world-wide reputation. He tells his own story in engaging fashion, from his student days at the Louisville Medical College through his horse-and-buggy days on the Oklahoma plains, to his work with tuberculosis and in the University of Oklahoma School of Medicine. This account is, in short, the human story of half a century of medical practice, extending from frontier practice to metropolitan practice in a time when medicine itself was passing from simplicity to complexity. *Edward A. Shaw*

HEALTH-SEEKERS IN THE SOUTHWEST, 1817-1900, by Billy M. Jones. 254 pp., University of Oklahoma Press. $6.95.

Modern as the health resorts in the Southwest may be, the idea behind them is not. In the nineteenth

century the climatic appeals of the Southwest were so strong that nearly one out of four of all permanent settlers was a health-seeker. This book is a full account of the large-scale movement westward to escape the "bad air" of the East and to seek a cure in the pure dry air of the southwestern plains and mountains—in Colorado, Arizona, and Texas, for example. The legend of "the health frontier" is interesting and important in the settlement of the Southwest. *Edward A. Shaw*

MEDICAL BIOGRAPHIES: THE AILMENTS OF THIRTY-THREE FAMOUS PERSONS, by Philip Marshall Dale, M.D. 260 pp., University of Oklahoma Press. $5.95.

This volume combines with unusual success biography and medical science: The ills of a select group of famous and accomplished persons discussed in the light of modern medical knowledge. It is, in effect, a long-delayed and lively post mortem. The notables extend from Christopher Columbus to Robert Louis Stevenson, with such illustrious persons as Henry VIII, Andrew Jackson, John Keats, and Grover Cleveland in between. The connection between tuberculosis and genius has long been discussed, but how many historians have considered the effect on Napoleon of his peptic ulcer? Doctor Dale's diagnoses are interesting and, in a sort of macabre way, fun to read. *Edward A. Shaw* □

Miscellaneous Advertisements

FOR SALE: Complete office furnishings including electrocardiogram equipment. Contact R. Q. Goodwin, M.D., 524-2061.

TWO GENERAL PRACTITIONERS needed for clinic associated with 45-bed hospital; town of approximately 7,000 population with large trade area, principally an industrial community. Telephone 918 652-3337.

DILLON, COLORADO — Luxury condominum on lake, sleeps six, automatic kitchen, two bedrooms, two bathrooms, fireplace, magnificent view. Maid service. Ski Arapahoe, Keystone, Vail, Loveland and Breckenridge. Summer—fishing, sailing, pool, tennis. $60.00 nightly for six, less by week. S. C. Perceful, M.D., 3535 South Lafayette, Englewood, Colorado 80110. Phone 303 781-7824.

PHYSICIANS NEEDED: GP, pediatrician, obstetrician, for new six-physician clinic near expanding hospital in Edmond, Oklahoma. Rapidly growing suburban practice near Oklahoma City. Possible salary or partnership arrangement. Contact John L. Hackney, M.D., 120 North Bryant, Edmond, Oklahoma. 1-405-341-2233.

SENIOR GENERAL SURGICAL RESIDENT with family seeking a locums tenens position for all or part of July, 1971, in general practice or general surgical practice. Experienced in practice coverage and emergency room medicine. Reply to Key F., The Journal, Oklahoma State Medical Association, 601 N.W. Expressway, Oklahoma City, Oklahoma 73118.

ARKANSAS-PSYCHIATRY RESIDENCY in an excellent, dynamic diversified, non-obligated UNIVERSITY program. Stipends: $11,000-$14,000 plus fringe benefits. Write Wm. G. Reese, M.D., 4301 W. Markham (Slot 506), Little Rock, Arkansas 72201. Phone 501 664-5000.

EXCELLENT GENERAL PRACTICE OPPORTUNITY in community which needs several additional physicians. Desire to retire soon. Nearly new clinic for sale or lease; includes laboratory, x-ray, physio-therapy, pharmacy, and necessary space to accommodate two physicians. Contact Russel W. Lewis, M.D., 1901 West Broadway, Sulphur, Oklahoma 73086. □

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to thyroid replacement therapy



As your hypothyroid patients travel along the smooth road, let us be of service in these 4 specific ways:



1 FREE FILM AND BOOK ON HYPOTHYROIDISM: In a 30-minute, 16-mm. sound/color film, 5 prominent endocrinologists discuss "Thyroid Deficiency—Current Concepts of Diagnosis and Treatment". Film available on FREE loan to physician groups or hospitals.

A new book, soon to be published, is devoted to the clinical aspects of hypothyroidism. The author, a leading endocrinologist, describes the many faces of the condition and emphasizes the importance of clinical assessment of the patient. Write, or ask your Flint man, to be placed on our list to receive a free copy.



2 NEW THYROID FUNCTION TEST BOOK: Newly published *Guideposts to Thyroid Therapy* discusses the tests most appropriate for use with each type of thyroid medication. Fully describes thyroid function tests and places their relative values in perspective for physicians. It will give you valuable new insights into the role of these tests in diagnosis and treatment. FREE—ask your Flint man.



3 TO START THERAPY, FREE TAB-MINDER dispensing units, color-coded to match colors of SYNTHROID tablets in starting dosage strengths. TAB-MINDER helps patients to regularly take the thyroid dosage you prescribe, avoid medication errors. Ask your Flint man.

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MEDICATION DISPENSERS
TO START ALL YOUR PATIENTS ON SYNTHROID, IN THESE STRENGTHS:
0.05 mg. (white); 0.1 mg. (yellow); 0.15 mg. (violet); 0.2 mg. (pink).



4 SYNTHROID® INJECTION FOR THYROID EMERGENCIES: Whenever (as in myxedema coma) rapid replacement of thyroid hormone is needed to sustain life, prompt clinical response is essential. SYNTHROID INJECTION makes this therapy instantly available. Useful also in postoperative thyroid medication situations until oral therapy can be reinstated. Ask your Flint man for further information.



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DIVISION OF TRAVENOL LABORATORIES, INC.
Morton Grove, Illinois 60053

DOXIDAN® The Logical Laxative

To relieve constipation during pregnancy . . .



A time of circulatory stress

Doxidan gently relieves constipation in prepartum or postpartum patients and reduces the hemodynamic burdens of straining at stool.

gently . . . a highly effective fecal softener

predictably . . . a gentle peristaltic stimulant

economically . . . Doxidan costs less per effective dose*

Composition: Each capsule contains 50 mg. danthron N.F. and 60 mg. dioctyl calcium sulfosuccinate.

Dosage: Adults and children over 12—one or two capsules daily. Give at bedtime for two or three days or until bowel movements are normal.

Supplied: Bottles of 30, 100 (FSN 6505-074-3169) and 1000 (FSN 6505-890-1247).

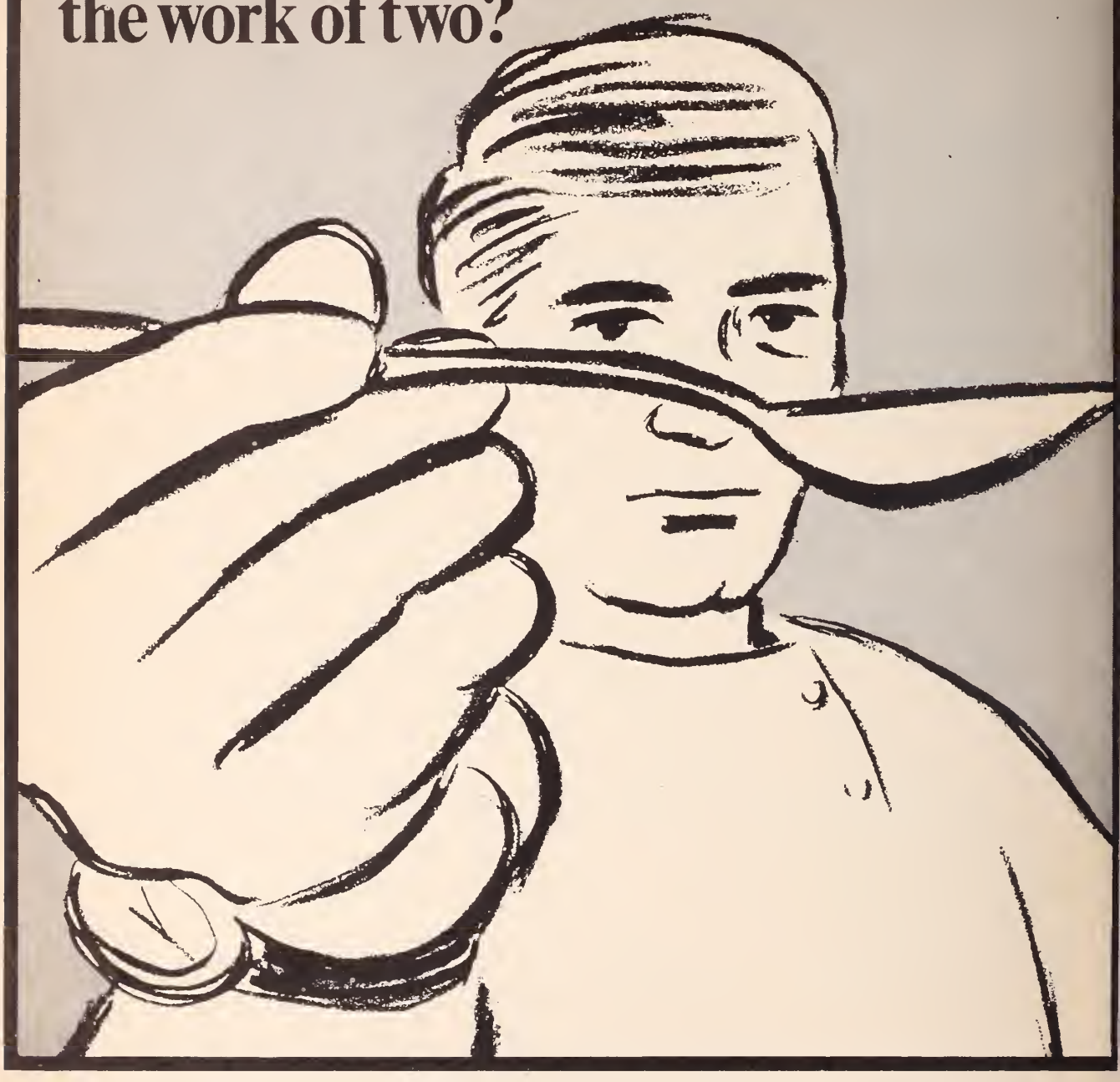
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HOECHST
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Somerville, N.J. 08876 U.S.A.

C-143

*based on actual drug store survey of prescribed dosages.

Can one prescription do the work of two?



Yes, Kolantyl®.

Kolantyl Gel/Wafers contain
aluminum hydroxide/magnesium hydroxide, and
Bentyl® (dicyclomine hydrochloride) too.

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The girth control pill



Tepanil® Ten-tab®

(continuous release form)

(diethylpropion hydrochloride, N.F.)

When girth gets out of control, TEPANIL can provide sound support for the weight control program you recommend. TEPANIL reduces the appetite—patients enjoy food but eat less. Weight loss is significant—gradual—yet there is a relatively low incidence of CNS stimulation.

Controindications: Concurrently with MAO inhibitors, in potients hypersensitive to this drug; in emotionolly unstoble potients susceptible to drug obuse.

Worning: Although generolly sofer thon the amphetamines, use with great coution in potients with severe hypertension or severe cordiovosculor diseose. Do not use during first trimester of pregnoncy unless potentiol benefits outweigh potentiol risks.

Adverse Reoctions: Rorely severe enough to require discontinuotion of theropy, unpleosont symptoms with diethylpropion hydrochloride have been reported to occur in relotively low incidence. As is charocteristic of sympothomimetic agents, it moy occosionolly couse CNS effects such os insomnio, nervousness, dizziness, onxiety, ond jitteriness. In controst, CNS depression hos been reported. In o few epilieptics on increose in convulsive episodes hos been reported. Sympothomimetic cordiovosculor effects reported include ones such os tochycordio, precordiol poin, orrhythmio, polpitotion, and increased blood pressure. One published report described T-wove chonges in the ECG of o heolthy young mole ofter ingestion of diethylpropion hydrochloride; this wos on isoloted experience, which hos not been reported by others. *Allergic phenomeno* reported include such conditions os rosh, urticorio, ecchymosis, ond erythemo. *Gastrointestinol effects* such os diorrheo, constipotion, nouseo, vomiting, ond obdominol discomfort hove been reported. Specific reports on the hemotopoietic system include two eoch of bone morrow depression, ogranulocytosis, ond leukopenio. A voriety of miscelloneous odverse reoctions hove been reported by physicions. These include comploints such os dry mouth, headoche, dyspneo, menstrual upset, hoir loss, muscle poin, decreosed libido, dysurio, ond polyurio.

Convenience of two dosage forms: TEPANIL Ten-tob toblets: One 75 mg. toblet doily, swollowed whole, in midmorning (10 o.m.), TEPANIL: One 25 mg. tablet three times doily, one hour before meols. If desired, on additional tablet moy be given in midevening to overcome night hunger. Use in children under 12 yeors of oge is not recommended.

T-107/4/71/U S PATENT NO 3,001,910

THE NATIONAL DRUG COMPANY
DIVISION OF RICHARDSON-MERRELL INC.
PHILADELPHIA, PENNSYLVANIA 19144



Painful night leg cramps...

unwelcome bedfellow for any patient– including those with arthritis, diabetes or PVD

One thing patients can sleep without, particularly patients with chronic disease conditions such as arthritis, diabetes or PVD, is painful night leg cramps. Although seldom the presenting complaint, night leg cramps can tie your patients up in painful knots. Now, just one tablet of QUINAMM at bedtime can usually bring an end to shattered sleep and needless suffering. Your patients will sleep restfully—gratefully—with QUINAMM, specific therapy to prevent painful night leg cramps.

Prescribing Information—Composition: Each white, beveled, compressed tablet contains: Quinine sulfate, 260 mg., Aminophylline, 195 mg. **Indications:** For the prevention and treatment of nocturnal and recumbency leg muscle cramps, including those associated with arthritis, diabetes, varicose veins, thrombophlebitis, arteriosclerosis and static foot deformities. **Contraindications:** QUINAMM is contraindicated in pregnancy because of its quinine content. **Precautions/Adverse Reactions:** Aminophylline may produce intestinal cramps In some instances, and quinine may produce symptoms of cinchonism, such as tinnitus, dizziness, and gastrointestinal disturbance. Discontinue use if ringing in the ears, deafness, skin rash, or visual disturbances occur. **Dosage:** One tablet upon retiring. Where necessary, dosage may be increased to one tablet following the evening meal and one tablet upon retiring. **Supplied:** Bottles of 100 and 500 tablets.

THE NATIONAL DRUG COMPANY
DIVISION OF RICHARDSON-MERRELL INC.
PHILADELPHIA, PENNSYLVANIA 19144

Quinamm™
(quinine sulfate 260 mg., aminophylline 195 mg.)

Specific therapy for night leg cramps

THIS SPACE CONTRIBUTED BY THE PUBLISHER AS A PUBLIC SERVICE

the quality of survival

With the steady improvement in the therapy of cancer, and consequent increase in the number of 5-year survivals, our programs reflect increasing concern with the future of the cancer patient—with the *quality* of his survival.

High priority is being given to the rehabilitation of cancer patients—those having had mastectomies, colostomies, laryngectomies, amputations, and other drastic treatments for cancer.

Our "Reach to Recovery" program is a dramatic example. This program helps the physician meet many special needs of the postmastectomy patient on the road to total recovery. Patients receive psychological reassurance and practical help from women who have had the same surgery.

The laryngectomee also receives the benefit of our rehabilitation program. Supported by the Society, the International Association of Laryngectomees, through its local IAL clubs, provides such services as individual and group speech therapy, psychological counseling, visits to new patients, safety training, public education and social activities.

Our rehabilitation programs not only give heart and help to patients but provide the physician with vital aids necessary to improve the *quality* of survival.

American Cancer Society



Efudex®
(fluorouracil)
cream/solution

In the treatment of solar/actinic keratoses–
An alternative to cold, fire and steel

2/23/68
Before treatment with 5% 5-FU cream. Patient R. G., 78 years old, shows extensive skin changes due to weathering and severe solar/actinic keratoses.

3/26/68
Following one month of therapy. Intense erythematous reaction is seen at sites of keratoses. Normal skin has not reacted. Some areas which had reacted initially have undergone healing despite continued topical application of 5% 5-FU.

6/11/68
Ten weeks after discontinuance of therapy. All areas have healed completely. Residual mild erythema remains in some areas. This patient also had seborrheic keratoses which, as expected, have not reacted. There is no evidence of residual lesions or recurrences.



ROCHE
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Nutley, N.J. 07110

An alternative to conventional therapy

Efudex (fluorouracil) offers the physician a topical alternative to cryosurgery, electrodesiccation and cold-knife surgery in the treatment of solar/actinic keratoses. It is effective, comparatively inexpensive and especially well suited for treatment of these multiple lesions. Important, too, is the highly desirable cosmetic result. Clinical experience demonstrates that treatment with Efudex results in an extremely low incidence of scarring.*

Highly effective

In clinical trials, depending on the dosage form and strength used, complete involution occurred in 77 to 88 per cent of lesions following treatment. The rate of recurrence was low, ranging from 1.7 to 5.6 per cent up to a year after completion of therapy. When new lesions appeared, repeated courses of Efudex therapy proved effective.*

Predictable therapeutic response

Two to four weeks constitutes a typical course of Efudex therapy. The response is usually characteristic and predictable. After three or four days of treatment, erythema begins to appear in the area of keratoses. This is followed by an intense inflammatory response, scaling and occasionally moderate tenderness or pain. The height of the inflammatory reaction generally occurs two weeks after the start of therapy, and then begins to subside as treatment is stopped. Within two weeks of discontinuing medication, the inflammation is usually gone. A mild erythema may remain for two or three months before gradually receding. Since this response is so predictable, lesions which do not respond should be biopsied.

Two strengths—two dosage forms

Efudex is available as a 2% or 5% solution or as a 5% cream. It is applied twice daily by the patient with a nonmetal applicator or suitable glove.

Before prescribing Efudex, however, two important considerations: First, please consult the complete prescribing information for precautions, warnings and adverse reactions. Second, advise the patient that treated lesions should respond with the characteristic but transient inflammation. A positive sign that Efudex is working for them.

Before prescribing, please consult complete product information, a summary of which follows:

Indications: Multiple actinic or solar keratoses.

Contraindications: Patients with known hypersensitivity to any of its components.

Warnings: If occlusive dressing used may increase inflammatory reactions in adjacent normal skin. Avoid prolonged exposure to ultraviolet rays. Safe use in pregnancy not established.

Precautions: If applied with fingers, wash hands immediately. Apply with care near eyes, nose and mouth. Lesions failing to respond or recurring should be biopsied.

Adverse Reactions: Local—pain, pruritus, hyperpigmentation and burning at application site most frequent; also dermatitis, scarring, soreness and tenderness. Also reported—insomnia, stomatitis, suppuration, scaling, swelling, irritability, medicinal taste, photosensitivity, lacrimation, leukocytosis, thrombocytopenia, toxic granulation and eosinophilia.

Dosage and Administration: Apply sufficient quantity to cover lesion twice daily with nonmetal applicator or suitable glove. Usual duration of therapy is 2 to 4 weeks.

How Supplied: Efudex Solution, 10-ml drop dispensers—containing 2% or 5% fluorouracil on a weight/weight basis, compounded with propylene glycol, tris(hydroxymethyl)-aminomethane, hydroxypropyl cellulose, parabens (methyl and propyl) and disodium edetate.

Efudex Cream, 25-Gm tubes—containing 5% fluorouracil in a vanishing-cream base consisting of white petrolatum, stearyl alcohol, propylene glycol, polysorbate 60 and parabens (methyl and propyl).



new
Efudex®
(fluorouracil)
cream/solution

*Data on file, Hoffmann - La Roche Inc., Nutley, New Jersey.

Ef-
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Dicarbosil®
ANTACID

Your ulcer patients and others will confirm it. Specify DICARBOSIL 144's—144 tablets in 12 rolls.



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SOUTHWEST REGIONAL POISON CONTROL CENTER

Free toxicological consultation and information on medicinal and commercial products is available by phone when your patients are poisoned. Center is open 24 hours each day, seven days a week, with professionally trained staff present. Call area code 713, SO 5-1420, SO 5-2408 or 765-1011 University of Texas Medical Branch, Galveston, Texas 77550. Supported by PHS-CPF-69-21.

Brief Summary of Prescribing Information—9-9/22/69. For complete information consult Official Package Circular.
Indications: Essential hypertension. Use cautiously in patients with renal insufficiency, particularly if they are digitalized.
Contraindications: Anuria, oliguria, active peptic ulceration, ulcerative colitis, severe depression or hypersensitivity to its components contraindicates the use of Salutensin.
Warnings: Small-bowel lesions (obstruction, hemorrhage, perforation and death) have occurred during therapy with enteric-coated formulations containing potassium, with or without thiazides. Such potassium formulations should be used with Salutensin only when indicated and should be discontinued immediately if abdominal pain, distension, nausea, vomiting or gastrointestinal bleeding occurs. Use cautiously, and only when deemed essential, in fertile, pregnant or lactating patients. *Use in Pregnancy:* Thiazides cross the placenta and can cause fetal or neonatal hyperbilirubinemia, thrombocytopenia, altered carbohydrate metabolism and possibly electrolyte disturbances. Fatal reactions may occur with reserpine during electroshock therapy; discontinue Salutensin 2 weeks before such therapy. Increased respiratory secretions, nasal congestion, cyanosis and anorexia may occur in infants born to reserpine-treated mothers.
Precautions: Azotemia, hypochloremia, hyponatremia, hypochloremic alkalosis and hypokaliemia (especially with hepatic cirrhosis and corticosteroid therapy) may occur, particularly with pre-existing vomiting and diarrhea. Potassium loss or protoveratrine A may cause digitalis intoxication. *Potassium loss responds to potassium-rich foods, potassium chloride or, if necessary, discontinuation of therapy. Stop therapy if protoveratrine A induces digitalis intoxication.* Serum ammonia elevation may precipitate coma in precomatose hepatic cirrhotics. Discontinue therapy 2 weeks before surgery or if myocardial irritability, progressive azotemia or severe depression occur. Exercise caution in patients with chronic uremia, angina pectoris, coronary thrombosis or extensive cerebral vascular disease *or bronchial asthma* and in those with a history of peptic ulceration or bronchial asthma; in post-sympathectomy patients; in patients on quinidine; and in patients with gallstones, in whom biliary colic may occur. Patients who have diabetes mellitus or who are suspected of being prediabetic should be kept under close observation if treated with this agent.
Adverse Reactions: Hydroflumethiazide: Skin rashes (including exfoliative dermatitis), skin photosensitivity, urticaria, necrotizing angiitis, xanthopsia, granulocytopenia, aplastic anemia, orthostatic hypotension (potentiated with alcohol, barbiturates or narcotics), allergic glomerulonephritis, acute pancreatitis, liver involvement (intrahepatic cholestatic jaundice), purpura plus or minus thrombocytopenia, hyperuricemia, hyperglycemia, glycosuria, malaise, weakness, dizziness, fatigue, paresthesias, muscle cramps, skin rash, epigastric distress, vomiting, diarrhea and constipation. *Reserpine:* Depression, peptic ulceration, diarrhea, Parkinsonism, nasal stuffiness, dryness of the mouth, weight gain, impotence or decreased libido, conjunctival injection, dull sensorium, deafness, glaucoma, uveitis, optic atrophy, and, with overdosage, agitation, insomnia and nightmares. *Protoveratrine A:* Nausea, vomiting, cardiac arrhythmia, prostration, blurring vision, mental confusion, excessive hypotension and bradycardia. (Treat bradycardia with atropine and hypotension with vasopressors.)
Usual Dose: 1 tablet b.i.d.
Supplied: Bottles of 60, 600, and 1000 scored 50 mg. tablets.

Salutensin®
hydroflumethiazide, 50 mg./reserpine, 0.125 mg. protoveratrine A, 0.2 mg.

BRISTOL
BRISTOL LABORATORIES
Division of Bristol-Myers Company
Syracuse, New York 13201

The antihypertensive therapy that is easy to live with.*

When successive blood pressure readings confirm essential hypertension, consider Salutensin for:

Easy-to-live-with control. Gradual reduction of blood pressure leading to decisive, comfortable control is the common clinical response.

*Salutensin is usually well-tolerated (however, serious side effects can occur; see adjacent column for brief summary of prescribing information).

Easy-to-live with dosage. Two tablets a day usually achieves control. One to two tablets a day often maintains control without need for additional antihypertensive agents.

Easy-to-live with cost of therapy. The one to two tablets a day maintenance dose makes Salutensin economical to stay with. Important, because long-term control calls for long-term therapy.

Salutensin®

hydroflumethiazide, 50 mg./reserpine, 0.125 mg. protoveratrine A, 0.2 mg.





Safety isn't everything in an antibiotic.

Until you need it.

Such as the time when tooth staining becomes a matter of consideration.

Or the patient has impaired kidney function.

Or there is a potential for a severe allergic reaction with a penicillin-sensitive patient.

There is no guarantee of safety, even with Erythrocin.

Mild allergic reactions, abdominal discomfort and rare monilial overgrowth may occur. But serious reactions are extremely rare. And after 18 years, there are no known toxic effects on vital organs, bone, blood, nerves or teeth.

We'll ask *you* the question. Have you ever seen a severe reaction with Erythrocin? 101281



ERYTHROCIN®

ERYTHROMYCIN, ABBOTT

The potency you need -the safety you want

See next page for brief summary, listing indicated organisms, precautions, etc.

Erythrocin®

(ERYTHROMYCIN, ABBOTT)

Brief Summary

Indications

Erythrocin is indicated against gram-positive cocci — staphylococci (most strains), pneumococci and streptococci (including enterococci). Active against other pathogens, such as *Corynebacterium, Hemophilus, Clostridium, Neisseria,* and *Treponema pallidum,* the agents causing trachoma and lymphogranuloma venereum and primary atypical pneumonia caused by *Mycoplasma pneumoniae* (Eaton agent). Establish susceptibility of pathogenic organism when practical. Maintain therapeutic levels for ten days in the treatment of streptococcal infections to help prevent rheumatic fever and glomerulonephritis. Also consider local measures or surgery whenever indicated.

Contraindications

Known hypersensitivity to erythromycin. I.M. preparation also contraindicated in patients hypersensitive to the "caine" type of local anesthetics.

Precautions, Side Effects

Occasionally abdominal discomfort, cramping, nausea or vomiting may occur; generally controlled by reduction of dosage. Mild allergic reactions, such as urticaria and other skin rashes, may occur. Serious allergic reactions have been extremely infrequent; if hypersensitivity is encountered consider appropriate countermeasures, e.g., epinephrine, steroids, etc., and withdraw drug. The rare possibility of overgrowth of nonsusceptible organisms should be kept in mind; if it occurs withdraw drug and institute appropriate treatment. Local venous discomfort, generally mild, may occur with I. V. administration. I.M. preparation is suitable for deep intramuscular administration only; restrict use in children with small muscle mass. A mild transient local discomfort sometimes occurs following rectal insertion of Erythrocin Suppositories; discontinue if significant discomfort persists.

Administration and Dosage

I. ORAL: In adults with mild to moderate infections caused by readily-susceptible organisms 1.0 Gm. daily; more severe infections or those caused by less susceptible organisms 2.0 Grams daily; unusually severe infections up to 4 or more Gm./day. Daily dose in children is 15 to 25 mg./lb./day depending upon severity of infection. Daily dose should be administered in divided doses at 4-to-6 hour intervals. Continue treatment for at least 48 hours after symptoms have subsided and temperature has returned to normal. In fulminating or life-threatening infections, a parenteral form of erythromycin is preferred.

II. PARENTERAL: Intravenous administration may be continuous or intermittent (6 to 8 hour intervals): 1 to 4 Gm. daily in adults; 15 to 25 mg./lb./day in children, depending upon severity of infection. Recommended I.M. dose is 100 mg. (2 ml.) for adults, 50 mg. (1 ml.) for children 30 lbs. or more and 1.4 to 1.8 mg./lb. in smaller children. Injections are usually given at 6 to 8 hour intervals; may be given at 4 to 6 hour intervals for severe infections.

III. RECTAL: Following therapeutic doses are recommended in children: to 20 lbs., 1-125 mg. suppository every 8 hours; 20 to 40 lbs., 1-125 mg. suppository every 6 hours.

Change to oral therapy as soon as practicable.

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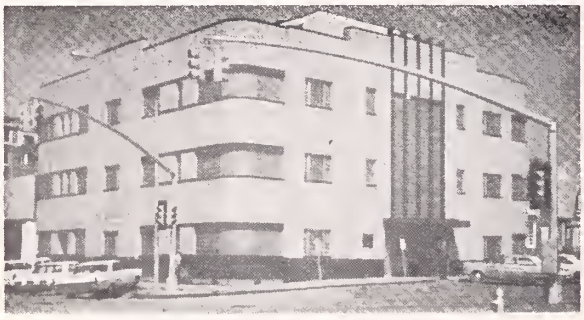
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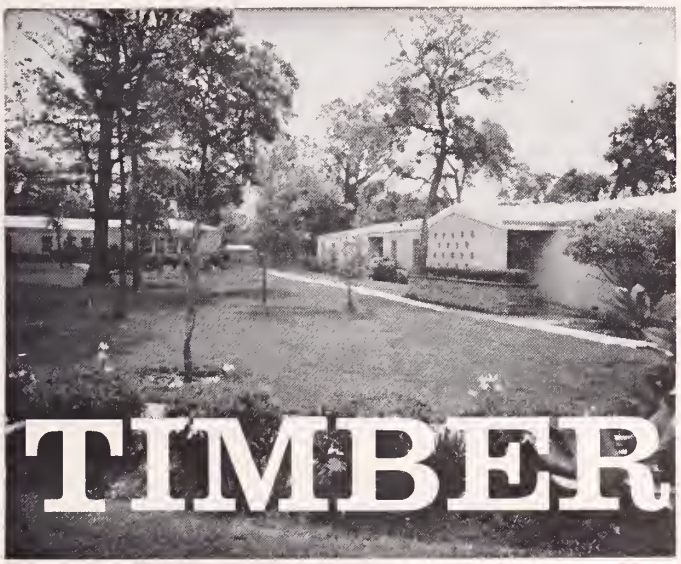
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The JOURNAL
of the Oklahoma State Medical Association

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Members of the Oklahoma State Medical Association, the constituent societies of the association, and all readers in general are invited to supply news items of general interest to the profession.

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BACK ISSUES

Microfilm copies of back issues of *The Journal* may now be purchased from University Microfilms, 300 North Zeeb Road, Ann Arbor, Michigan 48106.

The health proposals supported by Senator Edward Kennedy (D-Mass.) would only increase the federal bureaucracy and might reduce medical services, HEW Secretary Elliott L. Richardson told a news conference in London. "You could end up with a massive piece of machinery for the collection and distribution of taxes" paid by the public for health insurance, he said, adding: "The irony of the proposal is, if administered as apparently contemplated, the result could well be to reduce the supply of services by alienating the very people who have to supply them." According to United Press International, Richardson also said the administration agrees with critics who say health care programs in the U. S. are far behind other countries.

In the meantime Senator Kennedy has been working hard to stir up public support for his faltering national health insurance bill (S3). In mid-April he started a six-week tour of ten U. S. cities around the country to hold hearings on "the nation's health care crisis." He started his road show with endorsements from the mayors of two of the country's largest cities, New York and Philadelphia. Starting in New York City, Kennedy then held meetings in Carlston, West Virginia; Nashville, Tennessee; Cleveland, Ohio; Chicago, Illinois; Des Moines, Iowa; Denver, Colorado; Portland, Oregon; and was closing out his tour with meetings in San Francisco and Los Angeles in mid-May.

Medicaid total expenditures during calendar year 1970 were $5.6 billion nationwide. This is an increase of $928 million over the previous year, according to a report issued by HEW's Social and Rehabilitation Service. The $5.6 billion figure includes federal, state and local funds. Total public assistance expenditures for 1970, including Medicaid, were $14.4 billion.

Cigarette tar and nicotine levels are the subject of a bill introduced in the U. S. Congress by Senator Frank E. Moss (D-Utah). Amending the federal cigarette labeling and advertising act, Moss' bill would require the Federal Trade Commission to establish acceptable levels of tar and nicotine content in cigarettes. The Senator said that toxic inhalants in cigarettes should be limited, just as limits are placed on polutants, tolerances for contaminates and food, flamability standards for fabrics, and limits on impurities in medicines and water.

Despite a general leveling of the economy, the price of medical care rose more sharply on the Labor Departments Consumer Price Index during 1970 than for any year since 1947. The medical care listing on the CPI rose 7.3 percent from December, 1969 to December, 1970. A listing of all consumer goods and services rose 5.5 percent during that period, a noticeable slowdown from the previous year. Prices for hospital room and board rose 13.5 percent during the 12 months of 1970; physician's fees rose 8.1 percent; dentist's services increased 5.5 percent and drug prices rose 2.5 percent. During the four years ending last December, the Index for medical care rose 28.7 percent—30.1 percent for physician's services, 66.1 percent for hospital daily charges, 25.3 percent for dental services and 3.8 percent for drugs.

The U. S. Infant Mortality Rate, long a point of controversy between organized medicine and critics of the U. S. Health Care System, reached an all time low last year according to HEW's National Center for Health Statistics. The 1970 rate dropped 4.3 percent from the previous year to 19.8 deaths of babies under one year of age for each 1,000 live births. HEW says that there have been comparable changes in other national infant mortality rates, meaning the U. S. probably still ranks about 14th in the world. It is contended that the U. S. rates cannot be validly compared with many other countries because of differences in reporting systems.

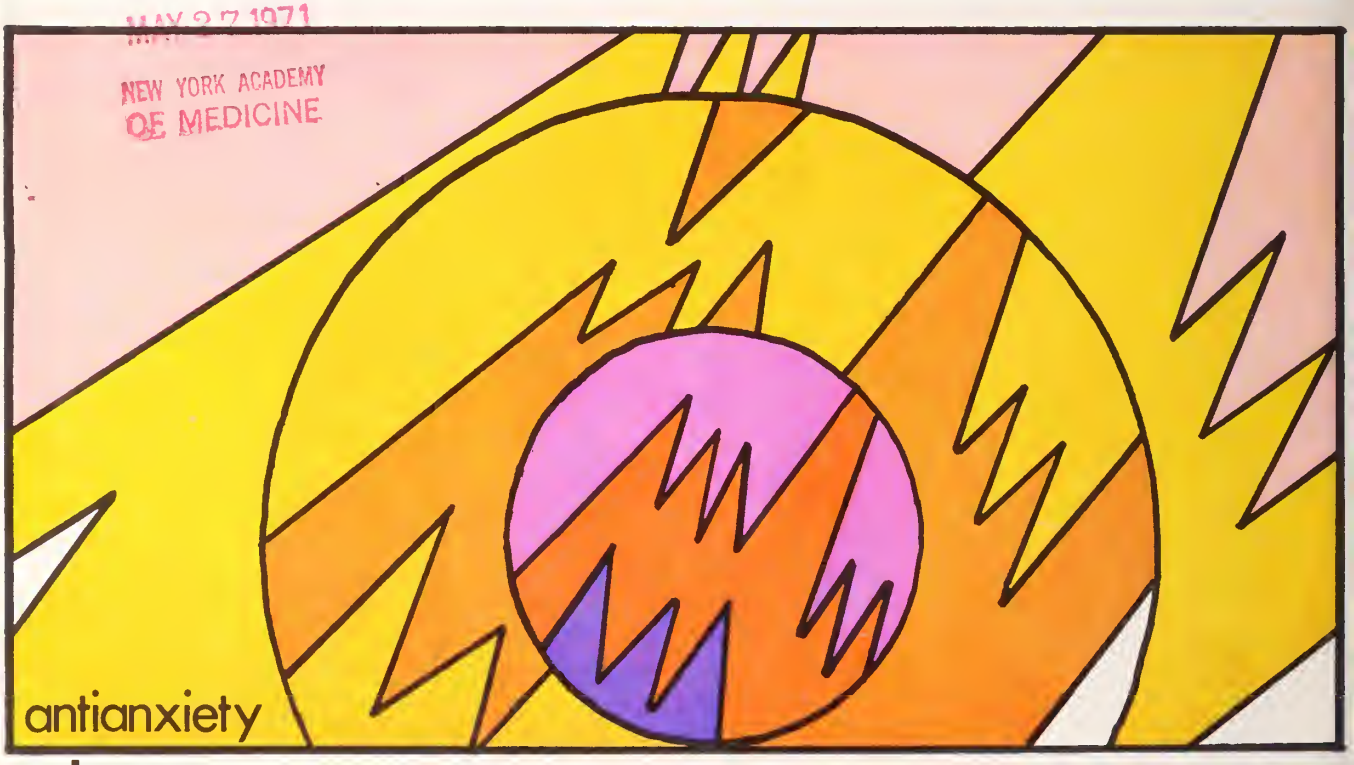
Medical schools in the U. S. and Canada are now receiving grants totaling $955,725 from the American Medical Association's Education and Research Foundation. The checks for the 109 existing and developing U. S. medical schools are being sent to state medical associations for presentation to the schools. Since 1960 AMA-ERF has contributed $12 million to medical schools. □

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Precautions: In the elderly and debilitated, and in children over six, limit to smallest effective dosage (initially 10 mg or less per day) to preclude ataxia or oversedation, increasing gradually as needed and tolerated. Not recommended in children under six. Thaugh generally not recommended, if combinatian therapy with other psychotropics seems indicated, carefully consider individual pharmacologic effects, particularly in use of potentiating drugs such as MAO inhibitors and phenothiazines. Observe usual precautions in presence of impaired renal or hepatic function. Paradoxical reactions (e.g., excitement, stimulation and acute rage) have been reported in psychiatric patients and hyperactive aggressive children. Employ usual precautions in treatment of anxiety states with evidence of impending depression; suicidal tendencies may be present and protective measures necessary. Variable effects on blood coagulation have been reported very rarely in patients receiving the drug and oral anticoagulants; causal relationship has not been established clinically.

Adverse Reactions: Drowsiness, ataxio and confusion may occur, especially in the elderly and debilitated. These are reversible in most instances by proper dasage adjustment, but are also occasionally observed at the lower dosage ronges. In a few instances, syncope has been reported. Also encountered ore isoloted instances of skin eruptions, edemo, minor menstrual irregularities, nausea and constipation, extrapyramidal symptoms, increased and decreased libido—all infrequent and generally controlled with dosoge reduction; changes in EEG patterns (low-voltoge fast activity) may appear during and after treatment; blood dyscrasias (including agranulocytosis), jaundice and hepatic dysfunction hove been reported occasionally, moking periodic blood counts and liver function tests advisable during protracted therapy.

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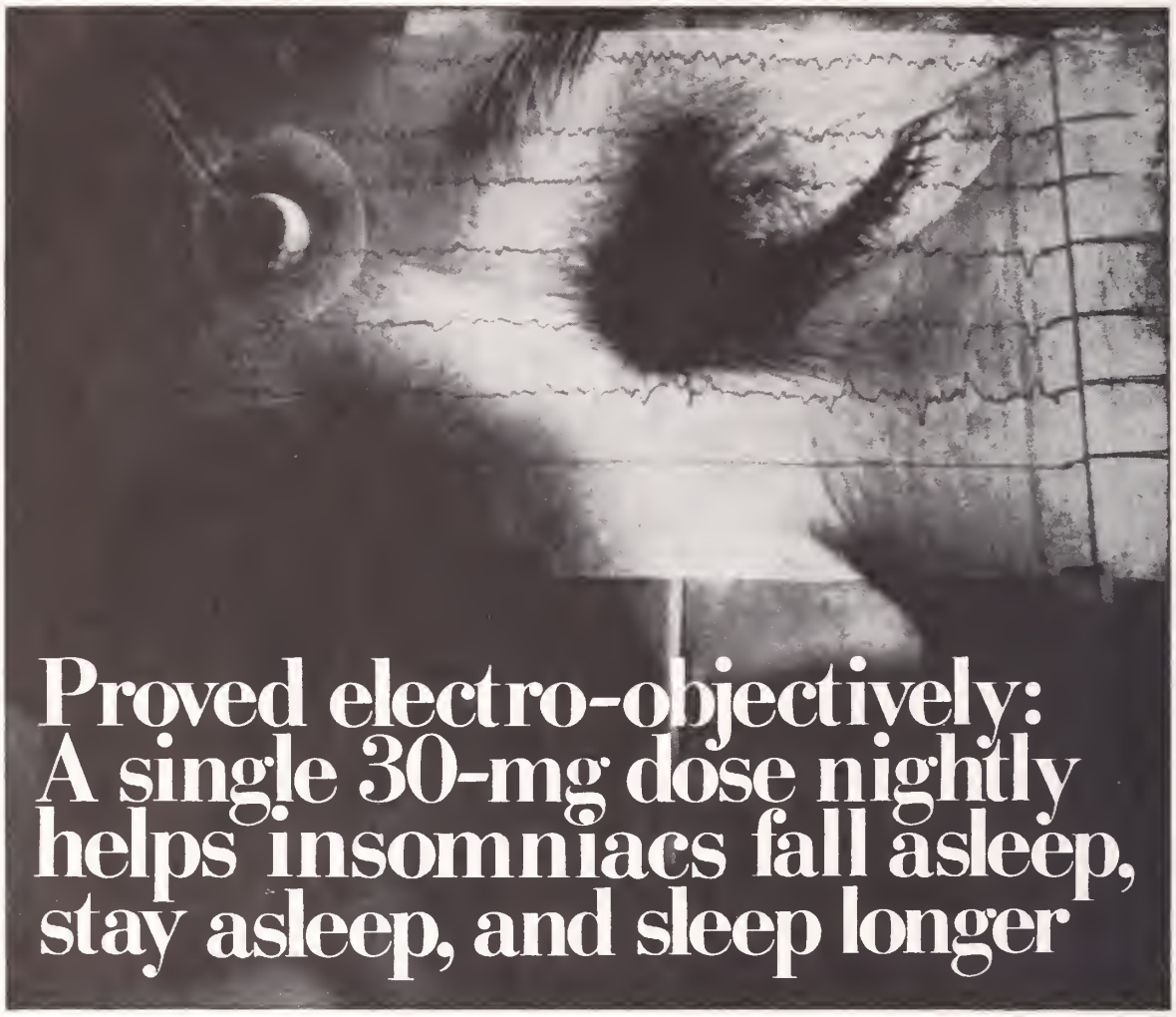
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Volume 64 — Number 6 — June 1971

JOURNAL

OKLAHOMA STATE MEDICAL ASSOCIATION

Proceedings: 1971 Oklahoma State Medical Association Annual Meeting



Proved electro-objectively: A single 30-mg dose nightly helps insomniacs fall asleep, stay asleep, and sleep longer

Controlled studies of 23 insomniac and 13 normal subjects treated with Dalmane (flurazepam HCl) in five sleep laboratories generated over 4000 hours of electroencephalographic, electro-oculographic and electromyographic tracings. These studies revealed that Dalmane 30 mg nightly usually induces sleep in 22 minutes and provides seven to eight hours of sleep.[1,2,3]

Moreover, Dalmane 30 mg was found to be useful in all common types of insomnia in which it was studied. Of drugs studied in a sleep laboratory,[1] Dalmane 30 mg was the only one that consistently reduced sleep induction time and maintained sleep nightly for 14 consecutive nights of use.

Confirmed clinically

Fifty-three controlled studies using a paired-night, double-blind crossover design have evaluated Dalmane clinically. In the majority of these, Dalmane (flurazepam HCl) significantly reduced sleep induction time and increased sleep duration. Dalmane and a placebo were alternated on successive nights in 2010 insomniacs, 1706 of whom were studied for a single night-pair, and the remainder for as many as fifteen paired-nights. A patient preference for Dalmane was apparent in the paired-night studies.

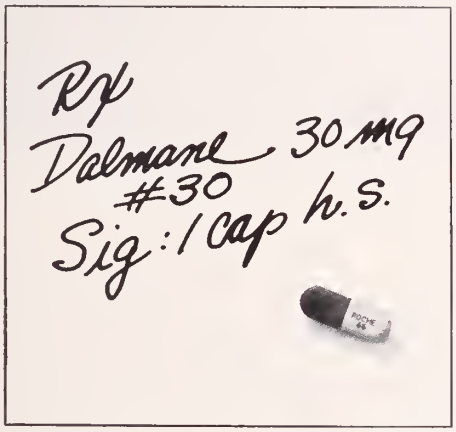
Dalmane was also preferred to certain hypnotics in two separate preference studies. In each of two double-blind studies, Dalmane 30 mg retained effectiveness for the total period of seven consecutive treatment nights, according to subjective/objective evaluations.

In summary, Dalmane is useful in all types of insomnia characterized by difficulty in falling asleep, frequent nocturnal awakenings and/or early morning awakening. It can be used effectively in patients with recurring insomnia or poor sleeping habits, and in acute or chronic medical situations requiring restful sleep.

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References: 1. Kales, A., *et al.:* "Effectiveness of Sleep Medications: All-Night EEG Studies of Hypnotic Drugs," in Proc. 7th Internat. Cong. Electroencephal. and Clin. Neurophysiol., San Diego, Calif., Sept. 13-19, 1969. **2.** Kales, A., *et al.:* "Psychophysiological and Biochemical Changes Following Use and Withdrawal of Hypnotics," in Kales, A. (ed): *Sleep: Physiology and Pathology,* Phila., Lippincott, 1969, p. 331. **3.** Data on file, Medical Department, Hoffmann-La Roche Inc.



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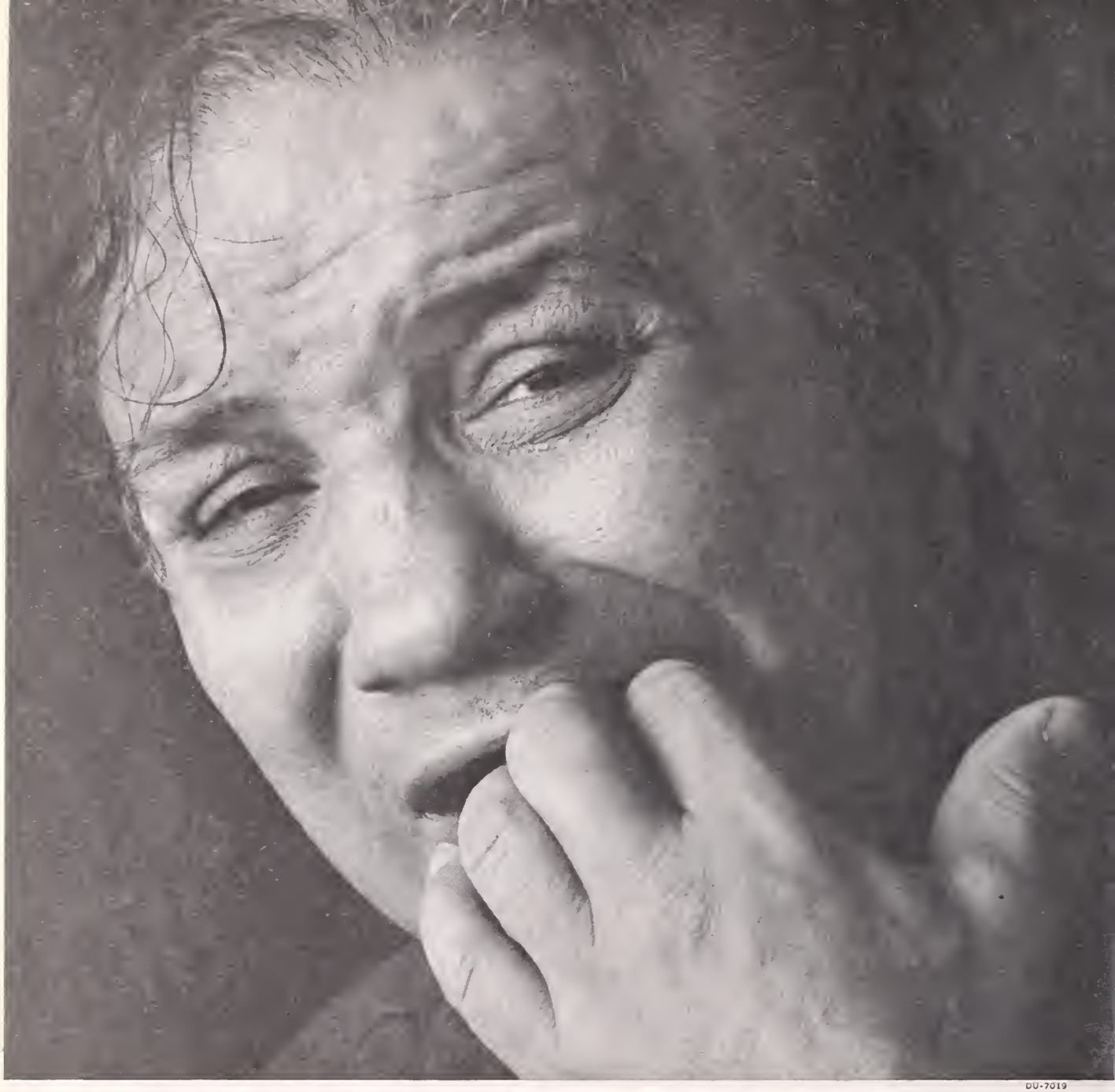
Warnings: Caution patients about possible combined effects with alcohol and other CNS depressants. Caution against hazardous occupations requiring complete mental alertness (*e.g.,* operating machinery, driving). Use in women who are or may become pregnant only when potential benefits have been weighed against possible hazards. Not recommended for use in persons under 15 years of age. Though physical and psychological dependence have not been reported on recommended doses, use caution in administering to addiction-prone individuals or those who might increase dosage.

Precautions: In elderly and debilitated, initial dosage should be limited to 15 mg to preclude oversedation, dizziness and/or ataxia. If combined with other drugs having hypnotic or CNS-depressant effects, consider potential additive effects. Employ usual precautions in patients who are severely depressed, or with latent depression or suicidal tendencies. Periodic blood counts and liver and kidney function tests are advised during repeated therapy. Observe usual precautions in presence of impaired renal or hepatic function.

Adverse Reactions: Dizziness, drowsiness, lightheadedness, staggering, ataxia and falling have occurred, particularly in elderly or debilitated patients. Severe sedation, lethargy, disorientation and coma, probably indicative of drug intolerance or overdosage, have been reported. Also reported were headache, heartburn, upset stomach, nausea, vomiting, diarrhea, constipation, GI pain, nervousness, talkativeness, apprehension, irritability, weakness, palpitations, chest pains, body and joint pains and GU complaints. There have also been rare occurrences of sweating, flushes, difficulty in focusing, blurred vision, burning eyes, faintness, hypotension, shortness of breath, pruritus, skin rash, dry mouth, bitter taste, excessive salivation, anorexia, euphoria, depression, slurred speech, confusion, restlessness, hallucinations and elevated SGOT, SGPT, total and direct bilirubins and alkaline phosphatase. Paradoxical reactions, *e.g.,* excitement, stimulation and hyperactivity, have also been reported in rare instances.

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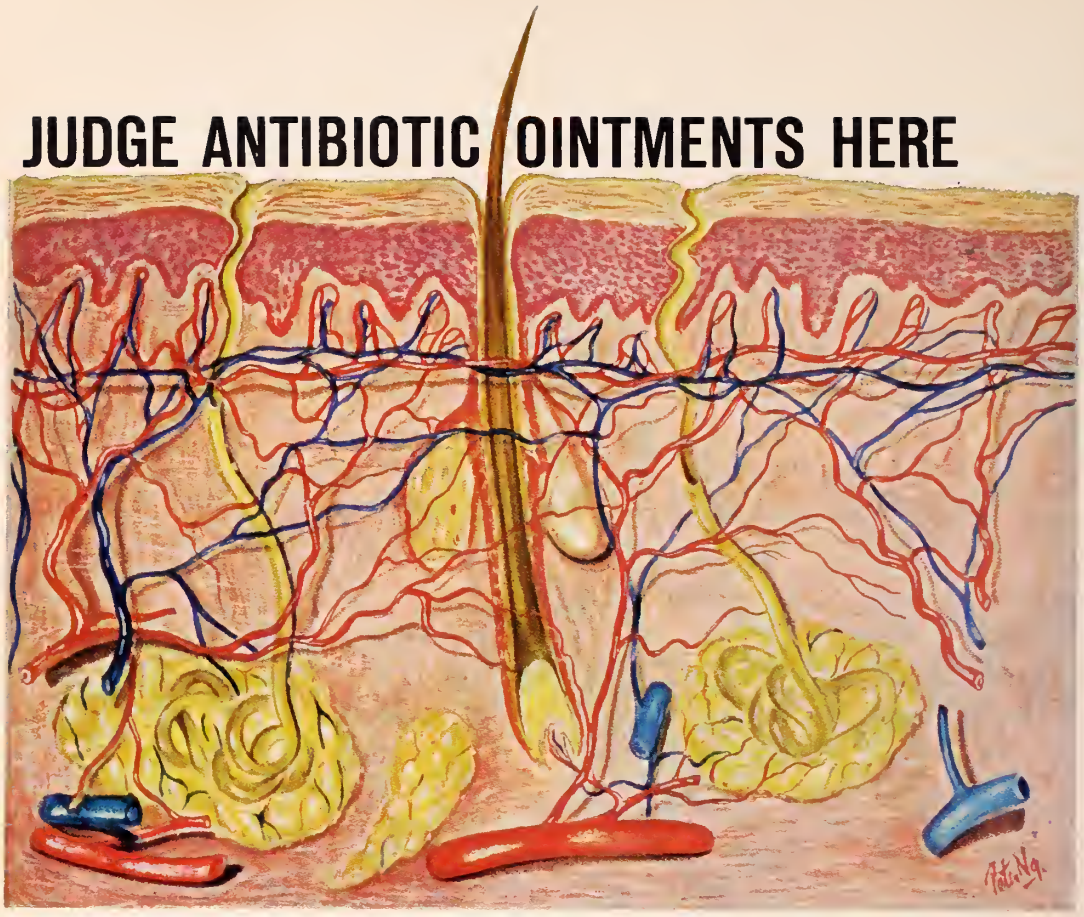
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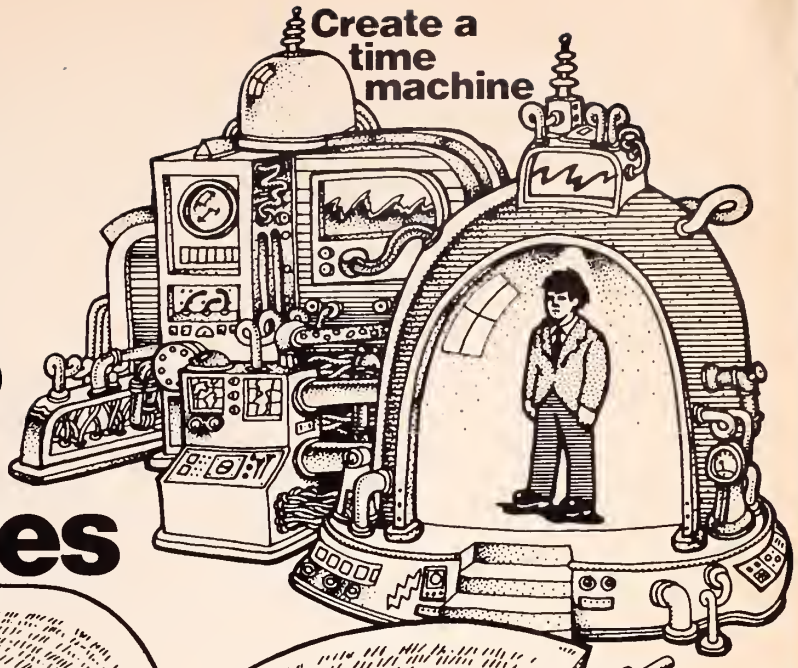
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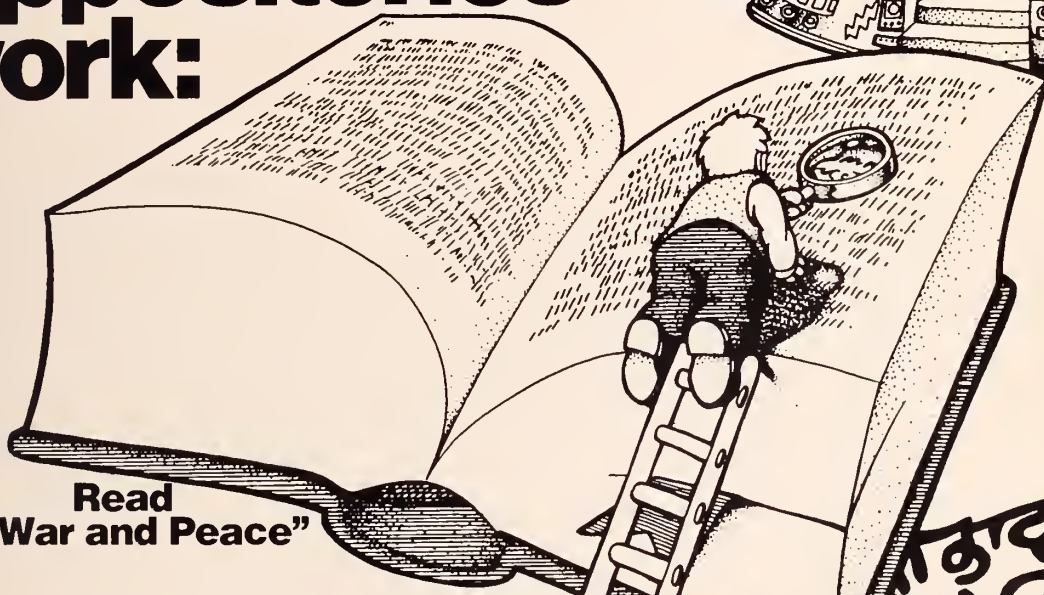
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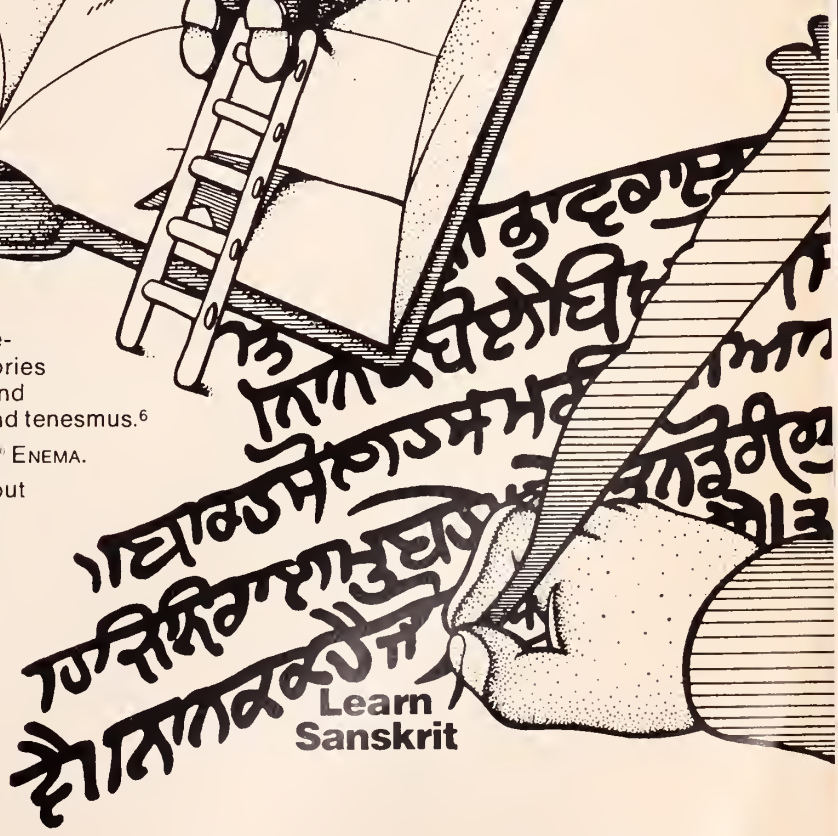
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References: 1. Blumberg, N.: Med Times 91:45, Jan., 1963. 2. Sweeney, W. J., III: Amer J Obstet Gynec 85:908, Apr. 1, 1963. 3. Weinsaft, P.: J Amer Geriat Soc 12:295, Mar., 1964. 4. Baydoun, A. B.: Amer J Obstet Gynec 85:905, Apr. 1, 1963. 5. Feder, I. A., Flores, A. and Weiss, J.: Amer J Gastroent 33:366, Mar., 1960. 6. Smith, J. J. and Schwartz, E. D.: Western J Surg 72:177, May-June, 1964.

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Warnings: If occlusive dressing used may increase inflammatory reactions in adjacent normal skin. Avoid prolonged exposure to ultraviolet rays. Safe use in pregnancy not established.

Precautions: If applied with fingers, wash hands immediately. Apply with care near eyes, nose and mouth. Lesions failing to respond or recurring should be biopsied.

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Adverse Reactions: Hydroflumethiazide: Skin rashes (including exfoliative dermatitis), skin photosensitivity, urticaria, necrotizing angiitis, xanthopsia, granulocytopenia, aplastic anemia, orthostatic hypotension (potentiated with alcohol, barbiturates or narcotics), allergic glomerulonephritis, acute pancreatitis, liver involvement (intrahepatic cholestatic jaundice), purpura plus or minus thrombocytopenia, hyperuricemia, hyperglycemia, glycosuria, malaise, weakness, dizziness, fatigue, paresthesias, muscle cramps, skin rash, epigastric distress, vomiting, diarrhea and constipation. *Reserpine:* Depression, peptic ulceration, diarrhea, Parkinsonism, nasal stuffiness, dryness of the mouth, weight gain, impotence or decreased libido, conjunctival injection, dull sensorium, deafness, glaucoma, uveitis, optic atrophy, and, with overdosage, agitation, insomnia and nightmares. *Protoveratrine A:* Nausea, vomiting, cardiac arrhythmia, prostration, blurring vision, mental confusion, excessive hypotension and bradycardia. (Treat bradycardia with atropine and hypotension with vasopressors.)
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Screening of Children for Urinary Tract Disease

BECAUSE OF ITS high frequency and potentially serious consequences, infection of the urinary tract constitutes a major public health problem. In recent years, it has become increasingly clear that pyelonephritis and infections of the urinary tract are not necessarily isolated occurrences and often represent a single episode in a lifelong process. When such infections begin in infancy and childhood, they may represent the forerunners of serious renal disease in later life.

In this issue, Wenzl and co-workers[1] describe the results of a pilot program to screen school children in Washington County, Oklahoma, for urinary tract diseases. In addition to screening for infections, these workers also used this opportunity to survey the population for additional diseases including diabetes, hypertension, and other abnormalities of the urinary tract. Of the total 824 children screened, which represented 98 percent of the seventh grade population of the county, 16 children (1.9 percent) had abnormal findings discovered either on urinalysis or urine culture. This represented 2.6 percent of the females and 1.3 percent of the males. The most common abnormality was significant bacteriuria.

Because epidemiologic studies of bacteriuria are so important, it is important to clarify this concept. Bacteriuria means the presence of bacteria in the urine. Bacteria present in the urine may have entered during the process of collection as contaminants from the container or from gross fecal or vaginal contamination, from the normal urethral flora, from periurethral tissues, or from organisms actually multiplying in the urine. The concept of "significant bacteriuria" was introduced to differentiate these possibilities and is predicated on knowledge of the manner in which the urine was collected and enumeration of the number of bacteria present in the sample. Persistent significant bacteriuria may be defined as the presence of a significant number of the same type of bacteria in a properly collected urine specimen on two or more occasions.[2]

Because the kidneys are often free of infection which involves the lower urinary tract, it stands to reason that bacteriuria is not synonymous with pyelonephritis or urinary infection, although some workers regard them as the same. On the basis of the data currently available, however, there is strong support for the view that bacteriuria is the common denominator of urinary tract infections. This should not be interpreted to mean that pyelonephritis will develop in every individual in whom bacteria are present in the urine, but rather that most cases of this disease are derived from a larger group of subjects with bacteriuria. Infected urine denotes present or potential involvement of the kidney, however, and this concept should be the guide in directing therapy. Significant bacteriuria is not a diagnosis but an important indicator of potential disease.[2]

Kunin,[3] in discussing the relationship of bacteriuria to urinary tract infection, has proposed the concept that bacteriuria, urinary tract infection, pyelonephritis, and significant renal disease are part of a broad continuum, evolving slowly with time in an often erratic and insidious manner. This continuum may terminate at any point or may produce a disease entity difficult to distinguish from other common causes of renal disease. On the basis of currently available information, the exact risk of developing significant renal disease as a consequence of persistent bacteriuria is unknown, and this situation will remain problematic until the natural history is established by appropriate long-term studies.

Although the incidence of significant bacteriuria in patients and the frequency of pyelonephritis at autopsy are similar, this does not necessarily establish a causal relationship. The meaning of significant bacteriuria seems clear when it occurs in the urine of a patient who presents clinical

manifestations and historical evidence, including instrumentation of the urinary tract, consistent with pyelonephritis. At least 50 percent of the patients with significant bacteriuria will be asymptomatic, however, and many of these will have no such history. MacDonald and co-workers[4] found a high correlation between the antemortem presence of significant bacteriuria (100,000 bacteria or more per ml of urine) and the presence of active pyelonephritis at autopsy in 100 unselected autopsies on adults. Although patients without bacteriuria rarely showed such postmortem findings, only about one-half the number of patients with significant bacteriuria had pathologic evidence of infection in the urinary system. Thus, in general, bacteriologically active pyelonephritis will nearly always be associated with bacteriuria but bacteriuria may be present without pyelonephritis. Certainly, bacteriuria, whether symptomatic or not, has particular significance when it occurs in infants and children.[5]

The most convincing evidence that bacteriuria can predict future episodes of pyelonephritis is found in studies of pregnant women. For example, Kass, Savage, and Santamarina[6] noted that if bacteriuria was eliminated during pregnancy, acute pyelonephritis was not encountered; overt urinary infection developed in about 50 percent of pregnant patients with bacteriuria treated with placebo. These observations certainly suggest a relationship between asymptomatic bacteriuria and inapparent active pyelonephritis.

Thus, the conclusion seems justified that the presence of bacteria in large numbers in the urine indicates (1) an increased risk of pyelonephritis, (2) active new pyelonephritis, or (3) persistent pyelonephritis.

The clinical significance of bacteriuria in school-age children is not entirely known. Undoubtedly some of these infections may be responsible for pyelonephritis seen in later life, but the percentage which will result in serious disease is problematical. Kunin and co-workers[7] found abnormalities on intravenous pyelography suggestive of pyelonephritis in 13.1 percent of 107 bacteriuric school children. Ureteral reflux was observed in 18.7 percent and the megacystis syndrome in 6.5 percent. Furthermore, these radiographic abnormalities could not be predicted accurately on the basis of the usual clinical criteria of symptomatology, past history, or the presence of pyuria. Children with incidental bacteriuria were three times as likely to suffer from overt urinary tract infection as those without bacteriuria. Certainly these and other studies dictate the need for careful urologic investigation of all bacteriuric children.

Work in this and several other centers has documented clearly the serious prognosis of urinary tract infection beginning in childhood. To summarize, studies of the outcome of urinary tract infection in children have shown that as many as 20 percent eventually die from the effects of the disease and that approximately one-third display continuing infection or significant renal damage; only about one-half of these children on later follow-up are completely healthy. Various studies have shown that the outcome is definitely worse in the following situations: In children whose first attack occurs before the age of two years, in those with structural abnormalities of the urinary tract at the time of the initial examination, in boys, and in those who experience multiple bouts of infection. These findings imply that efforts should be directed at preventing the initial overt infection in addition to intensifying the therapeutic attack on the disease in progress.[2, 8]

In view of the known tendency of structural abnormalities to initiate and perpetuate infection, correction of such mechanical disturbances may be a realistic approach. That this cannot be the sole approach, however, is shown in the results of studies by DeLuca, Fisher, and Swenson.[9] Of 1,279 patients with urinary tract infection, 80 percent had nonobstructive disease and an alarming proportion of these eventually developed severe renal damage. There can be little doubt that pyelonephritis beginning in infancy and childhood has the potential for a grave outcome. It is equally clear that if these serious consequences are to be averted, attention must be focused on the prevention and treatment of infections of the

urinary tract early in life.

The studies of Wenzl and colleagues[1] also substantiate several other important findings other than the results obtained. These findings confirm that the clean voided technique of collecting urine when properly performed and when combined with quantitative bacteriology constitutes a reliable method of collecting urine specimens for bacteriologic processing in females as well as in males and that this technique is satisfactory for epidemiologic screening of children. These studies also point out that considerable time can be saved in screening programs if examination of the urinary sediment is deferred until dip testing or urine cultures have revealed an abnormality. In addition, two children with other serious but unsuspected disorders — glomerulonephritis and asymptomatic hematuria — were identified in the screening program.

To the student of preventive medicine, the health of the patient beyond the immediate episode of illness looms large. The study of bacteriuria can be a model for further investigation of chronic diseases. Numerous studies in the distribution and frequency of bacteriuria among populations have been carried out, but clarification of our present incomplete knowledge regarding bacteriuria awaits the conception and fruition of broader longitudinal studies. □

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Children's Memorial Hospital
University of Oklahoma Medical Center
Oklahoma City, Oklahoma

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CAVEAT

—Physicians who have inadvertently misplaced their new controlled dangerous substance registration number, or who have not yet received a new number, may use the following phrase on prescriptions for controlled substances . . . "Federal Registration Applied For on ____ (Date)." Pharmacists have been instructed to honor this phrase on a prescription for a controlled substance until July 29th. After that date it will be necessary for the physicians' new registration number to be on all prescriptions for controlled substances.

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Any physician in need of assistance regarding the new narcotic laws should feel free to call or write the OSMA Headquarters in Oklahoma City. Direct such questions to the attention of Mr. Ed Kelsay. □



The 65th meeting of the Oklahoma State Medical Association is now history. We have come a long way since the first meeting in May of 1906 when the medical associations of Indian and Oklahoma Territories met in Oklahoma City and joined to form the present Oklahoma State Medical Association.

Commendations are in order for Doctor Floyd Miller, the Annual Meeting Committee Chairman, and Doctor Steve Adelson, the Scientific Program Chairman, as well as the Woman's Auxiliary and the many who assisted them, not named because of space limitation.

This has been a successful meeting from all standpoints excepting perhaps one, the financial. The final figures will not be tabulated for some time but it will be surprising if this meeting has paid its way. This is a perennial problem and difficult of solution. Although the total attendance did not reach the figure attained in the 1969 meeting in Tulsa, approximately 600 physicians were registered and the scientific sessions were well attended.

In my estimation this meeting will remain of significance because of two decisions of the House of Delegates. One, the resolutions for voluntary membership in the American Medical Association were turned down. This action pleased me as incumbent president even though I am in agreement with the principle of the resolutions and against compulsion. The inconsistency of our position was emphasized by a member of the House of Delegates. But I would again stress the following: The private practice of medicine is seriously threatened, the practitioners of medicine are acutely aware of this situation, and the tenor of the times call for a mite of political expediency.

The ratification of the resolution pertaining to the establishment of a peer review mechanism by the House of Delegates was in agreement with the thinking of the Planning Committee and Board of Trustees in regard to the necessity and extreme urgency for this action. The implementation of a foundation or other organization under the sponsorship of the state medical society will be an undertaking of massive proportion and will require the cooperation of all concerned.

Plans for the annual meeting in Oklahoma City in May of 1972 are already underway under the capable direction of Doctor John Blaschke, General Chairman, and Doctor Dale Groom, Scientific Chairman. Another successful meeting is assured.

The officers of your society are constantly striving to improve the benefits of the annual meeting. To this end the Planning Committee, under Doctor Ed Calhoon, has been given the charge to investigate further how increased attendance as well as the financial solvency of the meeting can be accomplished.

One meeting has been held recently and suggestions have been made. One of these is concerned with streamlining the House of Delegates meeting, thereby permitting the delegates to participate more fully in the various activities, particularly the scientific sessions. This and other suggestions are to be presented to the Board of Trustees. In the meantime, I am sure that comments, criticism (constructive or otherwise) and suggestions will be welcome. □

Sincerely,

Lucien H. Pascuzzi

Screening of Oklahoma School Children for Urinary Tract Disease: Results of a Pilot Study

ROBERT P. DILLARD, M.D.
EMORY C. BEECHWOOD, M.D.
ROBERT C. KING
JAMES E. WENZL, M.D.

Reliance on symptomatology may allow a significant number of children with serious urinary tract disease to go undetected. School screening programs effectively detect silent disease.

ALTHOUGH THE medical profession traditionally has concerned itself with the treatment of illness, an additional goal is the preservation of health. Physicians caring for children assume the responsibility for delivering the child into healthy adulthood. In recent years, it has become more apparent that many chronic diseases of adults have their origin in childhood, and this is especially true for diseases of the urinary system.[1] Unfortunately, chronic renal disease in the adult may have been relatively silent during the initial childhood stages.[2] For prevention, therefore, medical attention must be directed not only toward the known ill child, but also to the presumably well child. Screening programs appear to be the most efficient method to fulfill this objective, and the school system represents the most practical means of epidemiologic investigation of large groups of children.

In this study, seventh grade school children in Washington County, Oklahoma were screened for urinary tract disease, hypertension and diabetes mellitus. The screening program was conducted in the schools of the county with the aid of school nurses and teaching personnel, and with the cooperation of the local medical community.

DEMOGRAPHIC DATA

Washington County is located in the northeastern section of the state of Okla-

From the Department of Pediatrics, Children's Memorial Hospital, University of Oklahoma Medical Center, 800 NE 13th Street, Oklahoma City, Oklahoma 73104.
This study was supported by the Department of Pediatrics, University of Oklahoma Medical Center, and the Washington County Medical Society with the collaboration of the Oklahoma Regional Medical Program.

homa. It has a population of almost 50,000 persons. There are six cities or towns of which Bartlesville is the largest. The vast majority of the population is Caucasian, with non-Caucasians estimated at less than five percent. Washington County has one of the higher rates of per-capita income not only in the state but also in the nation.

There are two hospitals in the county, both located in Bartlesville. There are 49 physicians, 25 of whom practice a specialty. The physician population ratio is less than 1/1000.

Seventh grade school children were selected as the study group for this pilot investigation for several reasons:

1. Although there were seventh grade children in seven schools in the county, the majority were located in two schools of close geographic proximity (Central and Madison Junior High School, Bartlesville), thereby facilitating collection of specimens.

2. The children were of sufficient maturity and age to cooperate in obtaining urine specimens, blood pressure determinations and in filling out questionnaires accurately.

3. Only a small number of the females experienced regular menses and the problem of menstrual flow-contaminated urine was minimized.

4. There are few "drop-outs" from school in this particular age group, allowing a team to screen virtually all children in the community through an ongoing program.

5. By screening this age range it was hoped that renal and urinary tract disease could be detected before it had reached irreversible chronicity.

MATERIALS AND METHODS

The study team always consisted of two or more physicians, two school nurses, and volunteer school personnel. Approximately 100 children were screened each day. All urine specimens were collected during morning hours with minimal disruption of classroom work. The children were divided into two groups according to sex.

The males were instructed by a physician in the method of collecting a mid-stream specimen and were assisted by their physical education instructor or a physician-member of the team.

The females were instructed in the method of mid-stream clean catch urine collection, and each was assisted by a school nurse. Preparation consisted of three anterior to posterior wipes with Zephirin-soaked cotton balls, followed by drying with a sterile cotton ball. Mid-stream specimens were collected in a wide mouth sterile plastic container and after collection, an aliquot was immediately processed for bacteriologic analysis, using a commercially available culture system.* The remainder of each urine specimen was then taken to a local hospital where it was tested for pH, blood, glucose and protein content by means of strips impregnated with diagnostic reagents.** All urines which gave 3+ or 4+ reaction for protein on "dip stix" testing were retested by the heat and acetic acid method. If this confirmed a 3+ or great-

*UTI-tect Bacteria Diagnostic Test Kit: Courtland Scientific Products Division, Abbott Laboratories, North Chicago, Illinois

**HEMA-COMBISTIX: Ames Company, Division of Miles Laboratories, Inc., Elkhart, Indiana.

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Robert C. King was a third year medical student at the University of Oklahoma School of Medicine at the time work was done on this paper.

er reaction, the sample was considered to demonstrate significant proteinuria. Ten milligrams of urine was centrifuged at 3,000 rpm in a centrifuge for five minutes. The resulting pellet was resuspended to 0.2 ml. and examined microscopically for leukocytes, red blood cells, casts and bacteria.

Urine cultures were incubated at 37.5° C. for 24 hours and then read. All organisms were identified on the basis of biochemical characteristics and colony morphology on the original differential culture media. Colony counts were obtained on each specimen. Colony counts of less than 10,000 organisms/ml. were considered as within normal limits in accordance with the experience of other workers.[1-4] Colony counts between 10,000 and 100,000 organisms/ml. were considered suspect and unless the organism was a non-urinary pathogen, another specimen was analyzed. Colony counts of greater than 100,000 organisms/ml. were considered highly suspect and another urine specimen was obtained from these children with strict supervision during collection. If the colony count was again 100,000/ml. or greater and the same organism was isolated, it was considered indicative of urinary tract infection. The identification of all bacterial isolates of more than 10,000 organisms/ml. was confirmed by standard bacteriologic methods.

Results of microscopic examination of the urinary sediment were recorded in the standard manner. Blood pressure determinations were obtained immediately after collection of the urine specimen. Each child completed a form requesting his name, address, age, grade, sex, the name of his physician and whether he had ever had any kidney or bladder infection or disease. The children were also given a note which explained the project to their parents. The parents of all children with positive findings were contacted by the school nurse and advised to have their child examined by their family physician.

Table 1

CHILDREN WITH URINARY TRACT INFECTION

SUBJECT	SCHOOL	SEX	ORGANISM	URINALYSIS MICRO*	PROTEIN	B.P. (mm Hg)	PAST HISTORY
1.	Central	F	Proteus Species	Bacteriuria(a) / Bacteriuria	Negative	98/70	Negative
2.	Central	F	*E. Coli*	Bacteriuria / Bacteriuria	Negative	110/80	Negative
3.	Madison	F	Klebsiella-Enterobacter	Bacteriuria Pyuria(b) / Bacteriuria Pyuria	2+	120/80	Positive
4.	Madison	F	*E. Coli*	Bacteriuria / Bacteriuria Pyuria	Negative	94/50	Negative
5.	Dewey	F	*E. Coli*	Bacteriuria / Bacteriuria	Negative	130/74	Negative
6.	Vera	M	*E. Coli*	Bacteriuria Pyuria / 0	1+	124/78	Positive

* Microscopic examination was performed on two different specimens from each child.
a) Defined as more than 5 bacteria/hpf
b) Defined as more than 10 WBC's/hpf

RESULTS

A total of 824 children, representing 98 percent of the seventh grade population of Washington county, was screened. Sixteen children (1.9 percent) had abnormal findings discovered on either urinalysis or urine culture. This represented 2.6 percent of the females and 1.3 percent of the males (Table 1). Six children with urinary tract infection were detected. As expected, five of the six were females, for a prevalence rate of 1.3 percent. All infections were due to the common urinary tract pathogens, *E. coli*, Proteus and Klebsiella-Enterobacter. One male with a positive culture for *E. coli* at greater than 100,000 organisms/ml. had a past history of urinary tract infection. However, he currently was considered well and was not being followed for urinary tract disease. One of the females was previously known to have a urinary tract infection, but she also was considered well. Two males (0.5 percent) and five females (1.3 percent) were found to have significant proteinuria (Table 2). A presumptive diagnosis of glomerulonephritis was made in an additional boy whose urinalysis showed proteinuria, hematuria, red cell and granular casts but whose urine culture was negative (Table 3). Another male had hematuria alone. A third boy had 4+ glycosuria and diabetes mellitus was confirmed by his physician. Hypertension was not detected in any of the study group.

DISCUSSION

Our bacteriologic findings are in close agreement with those of Kunin and co-workers,[3] who found a 1.1 percent prevalence of bacteriuria in American school girls of various ages. Dodge and associates[4] found that 1.5 to 2.15 percent of elementary schoolgirls had bacteriuria. Both groups also documented the extremely low incidence of bacteriuria in boys of school age. It is of interest that only one of six children in our series was symptomatic, which is consistent with the experience of Kunin.[3]

By serial examination of schoolgirls, Kunin[5] observed a linear appearance of new cases yearly, and predicted that at least five percent of girls will have had one or more urinary infections by the time they are 18 years of age. It is from this group of girls that morbidity and mortality from chronic pyelonephritis in future years, and serious complications during pregnancy can be anticipated.

Whereas the serious potential of bacteriuria is well recognized, the significance of proteinuria is less well understood. In a study of 4,807 schoolchildren, Wagner, *et al.*[6] found that only 28 (0.6 percent) had 3+ or 4+ proteinuria on a single urine examination. Undoubtedly, some of these children had orthostatic proteinuria, but recent studies have confirmed that a significant number of patients with orthostatic proteinuria eventually show evidence of slowly progressive renal disease.[7] The relationship of persistent proteinuria to chronic renal disease is well established, and this finding demands careful medical evaluation.

We felt that no attempt should be made to differentiate orthostatic from persistent proteinuria, since both groups should be kept under medical surveillance. Accord-

Table 2

CHILDREN WITH PROTEINURIA

SUBJECT	SCHOOL	SEX	URINALYSIS		PAST HISTORY
			PROTEIN	MICRO	
1	Central	F	4+	Normal	Negative
2	Central	F	4+	Normal	Negative
3	Central	M	3+	Normal	Negative
4	Madison	F	3+	Normal	Negative
5	Ochelata	M	3+	Normal	Negative
6	Ochelata	F	3+	Normal	Repeated UTI'S
7	Vera	F	4+	Normal	Negative

Table 3

CHILDREN WITH MISCELLANEOUS RENAL OR METABOLIC DISORDERS

SUBJECT	SCHOOL	SEX	URINALYSIS MICRO	URINALYSIS PROTEIN	URINALYSIS GLUCOSE	PAST HISTORY
1.	Central	M	Negative	Negative	4+	Diabetes Mellitus Confirmed
2.	Central	M	RBC'S WBC'S RBC and Granular Casts	3+	Negative	Negative
3.	Central	M	50-100 RBC/HPF	1+	Negative	Negative

ingly, a single specimen with 3+ or 4+ proteinuria was judged "significant," and the child's parents were notified. Our finding of a higher percentage of proteinuria than did Wagner[6] is presumably accounted for by the older mean age of our population. It is known that older children have a higher prevalence of proteinuria.[6]

It is notable that none of the sixteen children with abnormality detected in this study would have necessarily been missed if microscopic examination of the urinary sediment had been reserved for those children with positive findings on culture or dip stix testing. Both of the boys with hematuria (Table 3) had urine specimens positive for occult blood on dip stix. We feel, therefore, that future programs could defer examination of the urinary sediment until dip testing or urine cultures revealed an abnormality. This deferment would result in an approximate fifty percent saving in time spent per child.

The results of this study confirmed our suspicion that screening Oklahoma school children for diabetes, renal and urinary tract disease is both feasible and worthwhile. Nearly two percent of all school children and over two and one-half percent of the females had presumptive evidence of a significant abnormality on screening. Females predominated in the abnormal group because of their higher prevalence of infection. The males, although having less infection, had more varied abnormalities. Screening a population of lower socio-economic status undoubtedly would uncover a higher percentage of abnormal conditions. Although Washington county has an unusually high socio-economic status and a high standard of medical coverage with a physician/population ratio well above the national average, only two of the sixteen children with abnormal results were receiving medical supervision for an abnormality detected on the survey. It is pertinent to note that an estimated 400 persons die from renal disease each year in Oklahoma.[8] Most of these are adults, and many die from renal disease which might have been cured or better managed by detection earlier in life.

A substantial interest in the project was expressed by students, parents, teachers, and the local medical community. No special problems arose. The techniques used in the screening program could be easily managed by school, technical and nursing personnel with minimal physician supervision and instruction. Inasmuch as school screening programs for non-fatal auditory and visual defects is an established fact, it seems logical to establish screening for urinary and renal diseases which have a much more ominous prognosis.

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active cooperation and participation, this study could not have been completed. □

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Lasers in Medicine

HUNTER L. LITTLE, M.D.

Unique properties of laser energy provide unique and effective therapeutic modalities for certain diseases. This paper discusses the use of lasers in serious disorders of the eye.

LASERS PRODUCE light as do ordinary lamps. However, ordinary light is the product of spontaneous emissions of photons emitted as electrons and jump from one orbit to another. Such a random emission of photons yields incoherent light of many wave lengths.

Laser is an acronym meaning light amplification by stimulated emission of radiation. That is, if during the brief interval while an atom is excited a wave of photons from a similar atom reaches it, the wave will stimulate the excited atom to emit radiation. The stimulated radiation will then have the same frequency and wave length as the stimulating wave. As the wave proceeds through the medium that contains many similarly excited atoms, the wave continues to grow or to be amplified by this process of stimulated emission.

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Lasers emit light with the following characteristics which differ from spontaneously emitted light: First, it is a highly *directional* beam since the wave can be built up only by travelling along the axis of the resonating mirrors of the cavity; secondly, the light is *intense* because the atoms are stimulated to emit much faster; thirdly, laser light is *monochromatic* because the condition for amplification is satisfied most strongly at a single wave length; finally, laser light is *coherent* because all atoms are stimulated to emit in synchronism with the wave that is reflected between the mirrors of the cavity.

Because of the above listed properties, laser light can do things that ordinary light cannot do. In medicine one takes advantage of these properties. It can be focused to one micron. This offers a great advantage in cytologic studies enabling one to damage certain aspects of cells and to study the cells following selected injuries. The monochromatic properties enable it to be selectively absorbed; thus, adjacent tissues which reflect the light are not damaged. The intense power is an advantage in spectroscopy where small bits of tissue are vaporized and analyzed. The intense power of the monochromatic beam of the Q-switched ruby laser has been used to remove cutaneous tattoos with minimal damage to overlying skin and surrounding tissue due to the specific absorption of the laser light

by the pigment of the tattoo. Holography, a method by which lasers provide three dimensional photography, offers a means for improved teaching techniques. Holograms are also being used as a means for storing information which will aid medicine through data processing. To date the effect of lasers in the treatment of neoplastic diseases has been disappointing. Since there is little to no evidence that lasers produce ionizing radiation in the manner that x-rays do, their effect on neoplastic cells has been purely one through the effect of heat produced by the absorption of light by the tissue. The laser theoretically provides a means to achieve bloodless surgery. If given sufficient energy, the argon laser with the blue-green spectrum should provide a means to dissect bloodlessly through organs such as liver, spleen, kidney and lung. Probably the most successful application of lasers in the field of medicine is in ophthalmology.

In ophthalmology the ruby laser (6943 A) and more recently the argon laser (4880 A and 5145 A) have been used to treat ocular diseases. The cases selected for treatment have been ones with retinal tears and with retinal and choroidal vascular leaks. More recently the laser has been used to perform iridectomies which may ultimately play a role in the management of selected glaucoma patients.

The initial experiences in ophthalmology were with the ruby laser which provides an excellent means for treating retinal tears and other selected retinal diseases.[1-4] However, because of the red wave length of the ruby laser it is not advantageous for treating the many retinal and choroidal vascular diseases seen in one's patients in the practice of ophthalmology.

During the past 18 months the treatment of ocular diseases with lasers has been done primarily with the argon laser. The author and his colleagues Doctors H. C. Zweng, R. R. Peabody, and A. Vassiliadis and Mr. N. Peppers have developed a system consisting of a gas ion continuous wave Argon laser beam delivered through a Zeiss slit lamp into the patient's eye via a Goldman contact lens.[5] The instrument provides the following advantages: binocularity, high magnification, excellent illumination, and optimal wave lengths for treating retinal tears and retinal and choroidal vascular lesions.

The remainder of the presentation will be limited to experiences with this technique in treating ocular diseases. It seems appropriate to state that the use of laser photocoagulation in the management of retinal and choroidal vascular diseases has been made possible through knowledge gained with fluorescein retinal angiography.[6, 7, 8] Since June 1969, our group has treated 392 eyes with the argon laser photocoagulator described above. The presentation will be restricted to the management of the following selected disease entities: central serous retinopathy, senile choroidal macular degeneration, histoplasmosis chorioretinitis, diabetes mellitus, and miscellaneous vascular diseases including sickle-cell C retinopathy. Because of insufficient follow-up on all the cases, only 131 cases will be included with follow-up ranging from three to eighteen months.

Central serous retinopathy is a disease entity occurring in younger individuals ranging in age from 25 to 45. It is a disease in which there is a localized vascular leak from the choroid which is the vascular layer behind the retina. Serum leaks from the capillaries of the choroid passing through Bruch's membrane and retinal pigment epithelium and dissects the overlying retina from its normal attachment to the retinal pigment epithelium. The localized detachment of the sensory retina involves the macular region and never extends into the peripheral retina as is seen with a rhegmatogenous or conventional type of retinal detachment caused by retinal tears. In central serous retinopathy there are no tears of the retina. With fluorescein angiography one is able to localize the vascular leak from the choroid by the accumulation of the fluorescein beneath a small elevation of the retinal pigment epithelium. It is at this point that the fluorescein is accumulated following its injection into the antecubital vein of the arm. In most instances the vascular leak from the choroid spontaneously seals and the overlying fluid is

absorbed with flattening of the detachment of the sensory retina. In the cases where this does not clear within two to three months or in cases where there have been repeated leaks with recurrent episodes of detachment of the sensory retina, laser photocoagulation is recommended. With the argon laser, we have treated 29 cases. Twenty-six or 90 percent have shown complete resolution. None of the cases has been made worse. Three of the cases treated have not responded at this time but it is anticipated that with subsequent laser treatment to the area that the leaks can be sealed.

Senile choroidal macular degeneration is a disease that involves from 25 to 40 percent of people over 65 years of age. In many states it ranks the number one cause of legal blindness and in most instances it causes bilateral loss of central vision. The disease is related to an aging process of the choroidal vessels within the macular region. Because of the aging changes of the vessels and the overlying Bruch's membrane, there is an accumulation of fluid between the retinal pigment epithelium and the underlying choroid and between the sensory retina and the underlying pigment epithelium. This is associated with an ingrowth of new formed vessels from the choroid which extend between the choroid and the retina. Newly formed vessels frequently produce hemorrhage and permanent loss of central vision. Laser photocoagulation in selected instances of senile choroidal macular degeneration offers a means of therapy in this disease. Even with argon laser photocoagulation, the prognosis in these cases is guarded. Thirty-five cases of senile choroidal degeneration have been treated with the argon laser with the following results. Eleven have improved, 11 have remained unchanged and 13 have been made worse. Each group therefore represents roughly about 33 percent of the total treated. As a result of experience gained in the treatment of senile choroidal macular degeneration, the author now recommends treating only those cases in which there is a localized choroidal vascular leak which is removed from the foveal area. Such cases should carry a better prognosis.

Histoplasmosis chorioretinitis is a presumptive diagnosis that has been given to patients who present with a specific clinical syndrome. The syndrome is that of multiple peripheral choroidal scars associated with a 93 percent incidence of positive histoplasmin skin tests and with a 90 percent incidence of fibrocalcific changes on x-ray. Since the organism of *Histoplasma capsulatum* has not been definitely identified in eyes having this syndrome and since the organism has not been cultured the diagnosis can only be presumptive at this time. The significance of this disease entity is the 77 percent incidence of macular involvement with 57 percent incidence of the eyes having 20/200 or worse. It is for this reason that when the lesions are noted in the macular area and when these lesions show leakage of serum and accumulation of fluorescein with intravenous fluorescein angiography, photocoagulation is indicated to seal the leaks before they produce subsequent hemorrhage and loss of central vision. Seventeen cases have been treated using the argon laser photocoagulator. Six have been made better for 35 percent improvement, five have shown no change representing 30 percent of the group, and six or 35 percent have shown further progression of loss of central vision in spite of treatment.

Diabetic retinopathy is one of the most difficult problems with which the ophthalmologist must contend. It accounts for approximately 20 percent of the blindness in the United States and in some states is the leading cause of blindness. The treatment of diabetic retinopathy is extremely difficult to evaluate because of natural fluctuations in the course of the disease and because of the marked variability in its clinical appearance. For this reason the cases that have been treated with the argon laser have been evaluated and classified in the following

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order: Those having intraretinal vascular leaks associated with intraretinal edema usually involving the macula; those presenting with neovascularization on the retinal surface; those presenting with retinal neovascularization over the optic nerve head or extending into the vitreous cavity (from the retina) without significant connective element; and finally, those having massive proliferation of new-formed vessels with connective tissue extending into the vitreous cavity which might be classified as advanced retinitis proliferans. Because of the growth of vessels into the vitreous cavity, conventional means of photocoagulation using the white xenon arc have not been successful since the vessels could not be obliterated. The argon laser enables the ophthalmologist to focus a beam that is readily absorbed by the blood vessels onto the areas of the newly formed vessels extending into the vitreous cavity. With this method one is able to obliterate such vessels in many instances and to prevent subsequent intraocular hemorrhage. On the other hand in cases where there is significant connective tissue element and where the ocular media is cloudy, the beam of the argon laser cannot be focused adequately on the vessels, thus precluding the possibility for obliteration of such vessels. Fifty cases have been treated and evaluated for diabetic retinopathy. Twenty-eight or 56 percent have improved, 14 or 28 percent have remained unchanged, and eight or 15 percent have shown further progression of the disease in spite of treatment. Treatment has consisted of focusing the argon laser on the areas of intraretinal vascular leakage demonstrated with fluorescein angiography in the cases of retinal edema and of focusing the beam onto the proliferating vessels extending off the optic nerve and off the retina in the vitreous cavity in the cases of retinitis proliferans. Best results have been obtained where the intraretinal vascular leaks were localized. In the proliferative retinopathy, the best results have been obtained where there has been minimal connective tissue element associated with proliferating vessels. To date it is premature to make any final conclusions in regard to the results of treatment; however, results at this time are certainly encouraging and indicate that argon laser photocoagulation will occupy a major position in the management of diabetic retinopathy in the future.

Several miscellaneous retinal vascular diseases have been treated with the argon laser. These include sickle-cell C retinopathy, Leber's miliary angiomatosis retinae, and von Hippel Lindau's disease. There have been no complications in the treatment of these disease entities and even though the number is quite small the results have been most encouraging.

In summary, laser photocoagulation provides a means by which an efficient coherent monochromatic light can be focused upon retinal lesions in the treatment of retinal tears, retinal vascular lesions, and choroidal vascular lesions. One attempts to prevent intraocular hemorrhage and retinal hemorrhages which account for major causes of blindness in this country. □

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Dosage and Administration: *In the Female.* One 250-mg. tablet orally three times daily for ten days. Courses may be repeated if required in especially stubborn cases; in such patients an interval of four to six weeks between courses and total and differential leukocyte counts before, during and after treatment are recommended. Vaginal inserts of 500 mg. are available for use, particularly in stubborn cases. *When the vaginal inserts are used* one 500-mg. insert is placed high in the vaginal vault each day for ten days and the oral dosage is reduced to two 250-mg. tablets daily during the ten-day course of treatment. Do not use the vaginal inserts as the sole form of therapy. *In the Male.* Prescribe Flagyl only when trichomonads are demonstrated in the urogenital tract, one 250-mg. tablet two times daily for ten days. Flagyl should be taken by both partners over the same ten-day period when it is prescribed for the male in conjunction with the treatment of his female partner.

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A well documented case of primary nidation involving the rectosigmoid is reported. Pathologic examination of the ovary and tube on the involved side failed to reveal any evidence of prior implantation. The possible etiology and rarity of this phenomenon is discussed.

INTRODUCTION

PRIMARY IMPLANTATION and proliferation of a fertilized ovum on a peritoneal surface without preceding nidation at any other site has been the subject of much debate. Numerous instances of abdominal pregnancy have been cited in the literature, but in most cases this has been the result of erosion through a tubal pregnancy or through a previously traumatized uterus with consequent uteroperitoneal fistula. Only a few well substantiated, isolated case reports of primary abdominal pregnancy exist in the literature. Studdiford[6] reported an early primary abdominal pregnancy located on the posterior aspect of a uterine horn. His criteria for the diagnosis of primary abdominal pregancy are: "(1) That both tubes and ovaries are normal with no evidence of recent or remote injury; (2) the absence of any evidence of a uteroperitoneal fistula; (3) the presence of a pregnancy related exclusively to the peritoneal surface and young enough to eliminate the possibility of secondary implantation following a primary nidation in the tube." Novak[5] rejects the concept of secondary implantation following tubal abortion on the grounds that separation of a pregnancy from its site in the fallopian tube would result in immediate death to the embryo. This thesis is substantiated by the absence of any report in the literature of a secondary abdominal pregnancy following removal of a ruptured tubal pregnancy where the products of conception were left in the peritoneal cavity.[1]

The purpose of this paper is to cite further support for the contention that a fertilized ovum can implant primarily on a peritoneal surface.

CASE REPORT

This 31-year-old P1011 was originally seen in our clinic because of six years of involuntary sterility. Her past history was unremarkable except for an episode of "pelvic infection" treated at another institution two years ago.

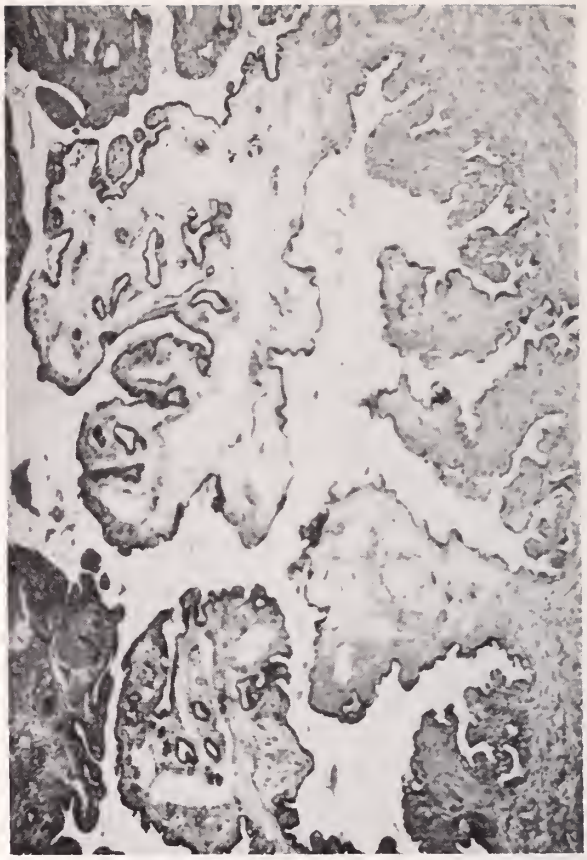
At the time of initial examination, the patient was terminating a three month course of cyclic combination type contraceptive pills prescribed because of heavy menstrual flow. In the prior six years there was no other attempt at birth control.

From the Department of Obstetrics and Gynecology and Pathology, U.S. Reynolds Army Hospital, Fort Sill, Oklahoma 73503.



U.S. Army photograph

Figure 1. Hysterosalpingogram revealing bilateral fimbrial closure.



U.S. Army photograph

Figure 2. Fimbriated portion of fallopian tube with marked chronic salpingitis and narrowing.

Pelvic examination was unremarkable and her husband's semen analysis was within normal limits.

Three days after the last pill induced menses, a Rubin Test was performed which was compatible with tubal occlusion. This was followed the same day by a hysterosalpingogram which showed bilateral fimbrial closure (Figure 1).

Endometrial biopsy performed on the first day of the following menstrual period revealed secretory endometrium. This period however, turned out to be unusually scant and two weeks later the patient began to experience bilateral lower abdominal pain without fever or bleeding.

Thirty days after the endometrial biopsy and 60 days after termination of the birth control pills, the patient presented in clinic with moderate bleeding and evidence of right lower quadrant peritoneal irritation. At this time an apparently complete decidual cast was passed in the examining room. Immediate culdocentesis revealed seven cc of unclotted blood and a pregnancy test (U.C.G.) was positive. A presumptive diagnosis of right ectopic pregnancy was made and laparotomy was performed. Upon opening the peritoneal cavity, approximately 400 cc's of clotted blood was noted. The uterus was slightly enlarged, but of otherwise normal appearance.

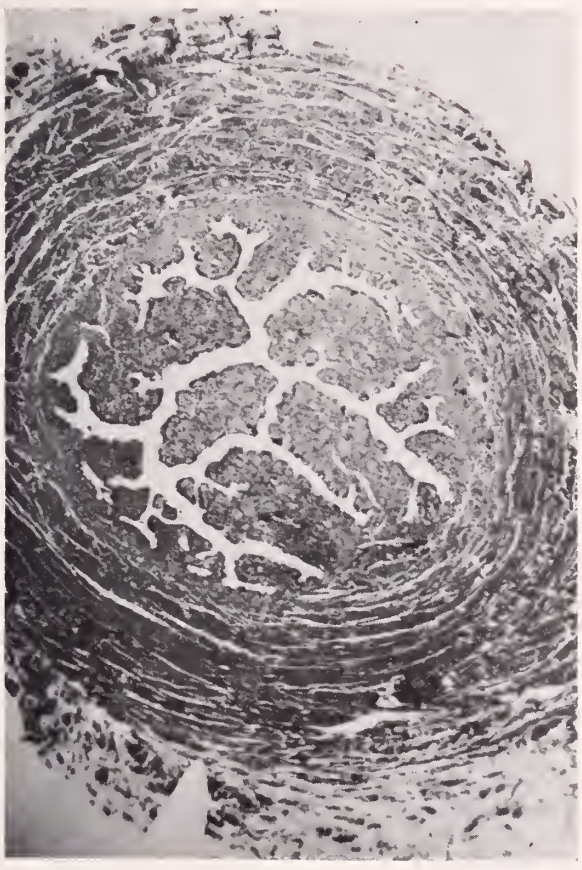
Inspection of the left adnexa revealed old inflammatory disease and both tube and ovary were plastered into the cul-de-sac by multiple adhesions. The entire right adnexa was almost obliterated in a mass of adhesions, and was fixed posteriorly and partially into the cul-de-sac.

Inspection of the right fallopian tube following its removal revealed evidence of chronic old inflammatory disease, but no evidence of a site of rupture. Moreover the bleeding was not controlled by salpingectomy and hence the right ovary was removed along with its adjacent clot. With

the entire right adnexa removed it was then ascertained that the bleeding was actually arising from a separate mass of tissue measuring 3 x 5 cm, which was adherent to the right side of the rectosigmoid. A portion of this tissue was removed and put into a separate specimen jar. No attempt was made to remove all this tissue as it had apparently eroded through the serosa of the sigmoid. The bleeding was controlled by packing and after careful inspection, to rule out complete perforation of the bowel, the abdomen was closed. The patient's postoperative course was uneventful and a subsequent U.C.G. two weeks later was negative.

PATHOLOGY

Microscopic: Sections of the decidual cast, which measured grossly 7 x 5 cm only minimal degentrative changes, focal Arias Stella phenomenon and absence of tropoblastic tissue.



U.S. Army photograph

Figure 3. One of numerous serial sections of fallopian tube showing no evidence of gestation or perforation.

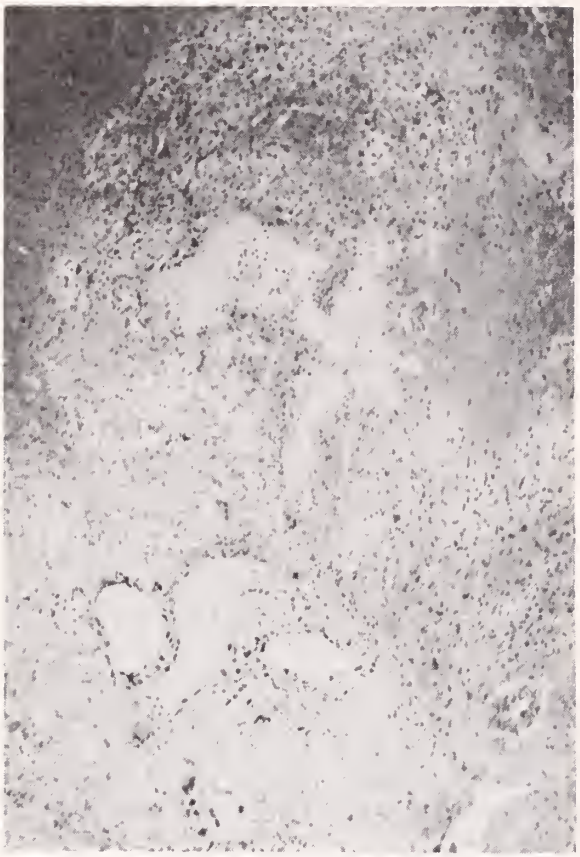
The right tube measured 7.5 cm in length. Both the serosal aspect of the infundibular and ampullary portion of the specimen were densely involved with adhesions. No evidence of gross perforation was present. Serial transverse cross sectional examination at 1.5 mm intervals revealed marked salpingitis isthmica nodosa, narrowing of the tubal lumen in the infundibular area and absence of decidual changes, clotted blood, trophoblastic tissue and perforation (Figures 2 and 3). The right ovary revealed a well-preserved corpus luteum of pregnancy which on serial section revealed no evidence of rupture or ectopic gestation. Five grams of hemorrhagic, friable tissue was submitted from the rectosigmoid area. Well preserved villi, consistent with a 35 to 40 day period of implantation were embedded in acutely inflamed and degenerating smooth muscle fibers which had undergone an early decidua-like response. No evidence of endometriosis was present (Figure 4).

DISCUSSION

No one disputes the ability of placental tissue to implant and grow on peritoneal surfaces. The literature abounds with reports of abdominal gestations in every possible site. However, in virtually all cases the bizarre location of these pregnancies can be attributed to an outward growth of villi through a tubal perforation or through the fimbriated orifice.[5]

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U.S. Army photograph

Figure 4. Biopsy from rectosigmoid revealing presence of villi.

The concept of secondary implantation of a tubal abortion has been rejected by Novak[5] and others,[2, 3, 4] on the grounds that an embryo would die shortly after separation from the tubal wall. Well documented evidence of primary abdominal pregnancy is sparse. Certainly Studdiford[6] presented a good case. Ahnquist and Lund[1] reported a bonafide primary peritoneal pregnancy along with an extensive review of the literature. In the case reported in this paper there was no evidence of a tubal gestation. Inspection of the non-involved left side revealed a closed, chronically inflamed tube bound down by multiple adhesions. Gross and microscopic examination of the right tube revealed no evidence of past or present pregnancy within the lumen and, furthermore, the serocal surface was intact. The only place where villi could be found was the rectosigmoid where the placenta had eroded through the serosa.

One can hypothesize that this phenomenon occurred because the narrowing at the fimbriated end of the fallopian tube was small enough to prevent the entry of the ovum and large enough to allow sperm to pass through into the peritoneal cavity. This is not an uncommon situation and one must therefore presume that the rarity of this situation may be a reflection of the difficulty of fertilization to take place in this circumstance as well as the relative inability of the peritoneum to provide a favorable environment for implantation. Normal smooth muscle and peritoneum generally lack the vascularity and hormonal responsiveness of secretory endometrium. How a viable situation occurred in this case remains unexplained. No past clinical or histologic evidence of endometriosis in the rectosigmoid region was present. The findings in the homolateral ovary which contained the corpus luteum of pregnancy were inconsistent with a prior occurring primary ovarian implantation.

This case is cited as further evidence that the phenomenon of primary abdominal (peritoneal) pregnancy does indeed exist. This is also believed to constitute the first well documented case of primary implantation occurring on the serosal aspect of the rectosigmoid.

ACKNOWLEDGEMENT

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Epidemiology of 25,294 Reported Gonorrhea Cases

G. REZA NAJEM, M.D., M.P.H.
THOMAS N. LYNN, JR., M.D.

The remarkably high prevalence of gonorrhea is related to the lack of satisfactory mass prevention measures, especially among the most vulnerable members of society, namely low socio-economic and young populations. Community attitude toward sexual permissiveness, health education, and treatment of cases, particularly the asymptomatic female, are the effective measures at the present time.

INTRODUCTION

THE FREQUENCY of gonorrhea continues to increase annually to the point of epidemic.[1, 2, 3] Gonorrhea is now the most frequently reported communicable disease in the nation and by the most conservative estimate, is clearly out of control.[2, 3, 4] So far no satisfactory mass control techniques have been developed. The current control methods have failed to reduce the gonococci attack rate.[1]

The Venereal Disease Branch of U. S. Public Health Service estimated that at least 1,680,000 cases of gonorrhea occurred in the U.S. in the fiscal year 1969; of which only 29.4 percent were diagnosed and reported to health departments.[5]

In order to define better the problem of gonorrhea in the State of Oklahoma, the Department of Community Health of the University of Oklahoma Medical Center, in cooperation with the Oklahoma State Health Department, conducted an extensive investigation of the reported gonorrhea cases in Oklahoma which occurred between January 1st, 1965 and December 31st, 1969.

From the Department of Community Health, University of Oklahoma Medical Center.

METHODS AND MATERIALS

The data were compiled from the Oklahoma State Health Department's Communicable Disease report cards.

The records of 25,294 gonorrhea cases which had been reported to the Oklahoma State Health Department from the entire State of Oklahoma during the five year period from January 1st, 1965 through December 31st, 1969 were compiled in this study. The public clinics (V.D. Clinics of the health departments, State Hospitals and Indian Hospitals) reported 61.2 percent of the total 25,294 cases. The military bases reported 22.6 percent, practicing physicians (M.D.) reported 13.3 percent, Doctors of Osteopathy reported 2.8 percent and the remaining 0.1 percent of the 25,294 cases were reported by others.

In most of the analyses, data from military sources were treated separately.

RESULTS

Figure 1 shows that only the trend of reported gonorrhea in civilian males has been increasing constantly each year, from 1,972 cases in 1965 to 3,309 cases in 1969, which is an increase of 40 percent.

Seventeen thousand nine hundred and twenty-five (or 70.9 percent of the total 25,294) cases were from urban areas and only 7,369 (or 29.1 percent) cases were from rural areas. Out of these 7,369 cases; 77.6 percent were military and 22.4 percent of them were civilian.

Table I indicates that the average annual rate of gonorrhea from 1965 through 1969 is 202.2 cases per 100,000 population. This table also compares the distribution of the cases in urban and rural areas and shows a generally steady increase in the urban areas.

Figure 2 shows that the highest reported county gonorrhea rate was 426.5 per 100,000 population in Muskogee County in 1969. The overall rate of reported gonorrhea cases for Oklahoma was 213.6 cases per 100,000 population in 1969. The reported gonorrhea rates for 59 counties of Oklahoma in 1969, were within the lowest one-third percentile range of the national rate of under 137 cases per 100,000 population for all the states in 1969. The rates in 14 counties were within the middle one-third percentile range of 137-258, and the remaining four counties of Oklahoma had rates within the highest one-third percentile range of the national rate of over 258 cases per 100,000 population in 1969.[2]

The mean annual highest reported gonorrhea rate was 1687.1 per 100,000 population in Negroes in 1965-1969. Whites experienced the lowest rate of 82.7, which was almost 20 times smaller than the Negro rate. Indians had a rate of 430.3 per 100,000 population, which was only one-fourth of the Negro rate in this study.

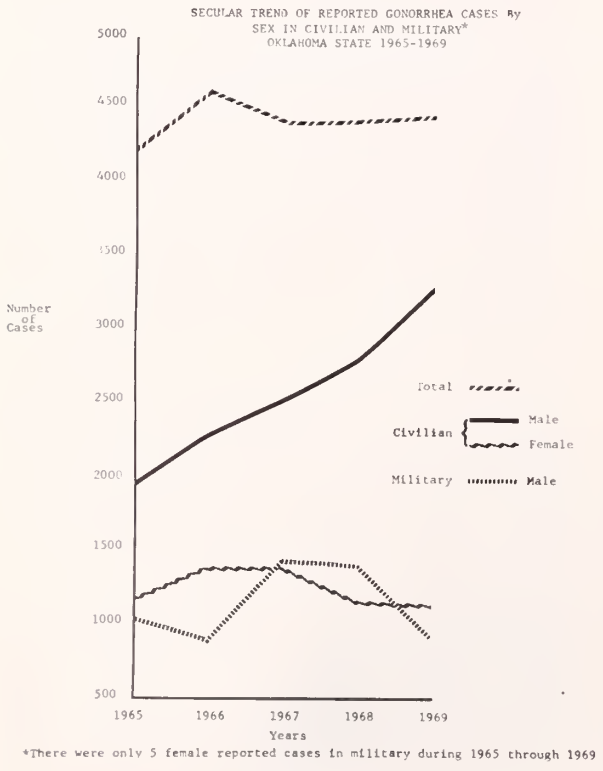


Figure 1

Table I
ANNUAL DISTRIBUTION OF THE REPORTED GONORRHEA CASES IN OKLAHOMA 1965-1969

Years	Urban No.	Urban %	Rural No.	Rural %	Total No.	Total Rate*
1965	2,937	16.4	1,308	17.7	4,245	173.4
1966	3,483	19.4	1,173	15.9	4,656	188.0
1967	3,707	20.7	1,728	23.5	5,435	217.8
1968	3,663	20.4	1,806	24.5	5,469	217.0
1969	4,135	23.1	1,354	18.4	5,489	213.6
Total	17,925	100.0	7,369	100.0	25,294	202.2

*Rate per 100,000 Population

Table II illustrates the comparison of races by sex in the civilian and military. The ratio of Negro:white rate was about 20:1 and Negro:Indian rate was 4:1 in this study. This table also indicates the ratio of male: female in civilian Negro to be considerably higher than other races. The overall ratio of male:female is about 2:1 in civilian and 3:1 if both civilian and military are combined.

The age range of the cases among civilians was from under one year to over 85 years of age. Table III compares the age distribution by sex. There were 229 (or about one percent) reported gonorrhea cases in the under 15 years of age category and 44 cases in the age category of 65 and over among the civilian group. Figure 3 illustrates that among the civilian population, male exceeded female cases after age group 10-14. The peak prevalence of reported gonorrhea cases was in the age group 20-24 years in both sexes and among both civilian and military populations in this study.

Table IV analyzes the percentage variation of the gonorrhea cases in Oklahoma from 1965 to 1969 by age groups in both civilian and military populations. The greatest increase was 92.7 percent in the age group 15-19 among civilians. After age 29 the incidence of reported gonorrhea cases decreased among civilians. The greatest decrease in the civilian rate was 40 percent in the age group 65-74. In general,

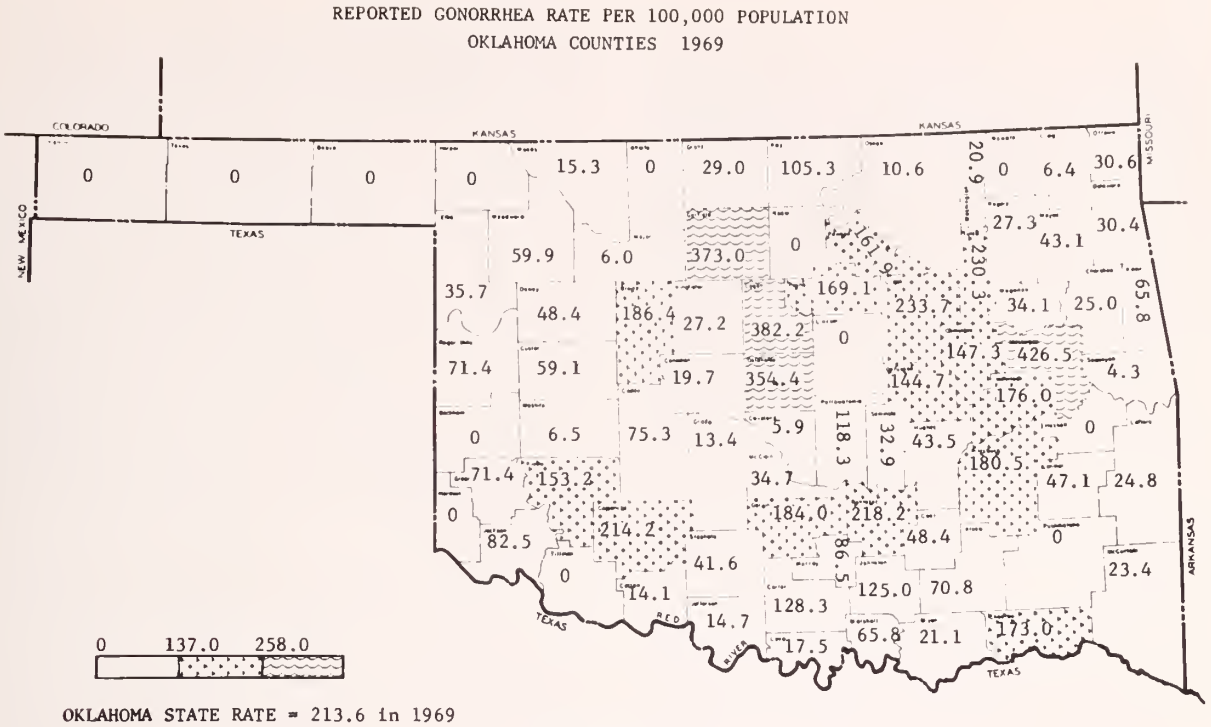


Figure 2

there was a total net increase of 43.3 percent among civilians from 1965 to 1969. However, in the military, except for an 8.7 percent increase in the age group 15-19, the incidence of the disease decreased from the year 1965 to 1969. There was a total net decrease of 13.3 percent in the military from 1965-1969.

There were no significant seasonal variations of reported gonorrhea during the five year period of 1965 through 1969.

DISCUSSION

The overall pattern of reported gonorrhea trend increased in Oklahoma from 1965 to 1969. The mean rate for the State of Oklahoma was 213.6 in 1969, which was lower than the mean rate of 245.9 in the nation in 1969.[2] Furthermore, according to the national studies,[5] reported cases of gonorrhea constituted only about 29 percent of the total actual gonorrhea cases occurring in the United States in fiscal year 1969.[5] If one adds the estimated unreported cases of gonorrhea to the reported cases, then the actual estimated gonorrhea prevalence will indicate the extent of the public health problem in a community.

The reason for such a high prevalence of

Table II
ACCUMULATED FIVE YEARS REPORTED GONORRHEA CASES
IN CIVILIAN AND MILITARY BY RACE* AND SEX
OKLAHOMA 1965-1969

RACE	CIVILIAN				MILITARY		TOTAL	
	Male	Female	Ratio Male:Female	Unknown Sex	Male	Female	No.	Rate*
White	4,195	2,558	1.6	12	2,628	4	9,397	82.7
Negro	7,933	2,902	2.7	6	3,070	1	13,912	1,687 1
Indian	648	727	0.9	5	12	0	1,392	430.3
Unknown	162	89	1.8	342	0	0	593	—
Total	12,938	6,276	2.1	365	5,710	5	25,294	202.2

*Race specific rate per 100,000 population of five years accumulated estimated population of each race, 1965-1969.

gonorrhea may be due to the fact that no satisfactory mass gonorrhea prevention and control techniques have thus far been developed.[4] Also, some or all of the following factors may contribute to the high incidence of the disease: 1) Increased permissiveness in sexual matters and widespread use of contraceptives,[13] 2) lack of proper education in matters of health and sex among the most vulnerable members of society,[6, 9, 10, 11] 3) short incubation period of gonorrhea,[6] 4) lack of reliable natural or acquired immunity against gonorrhea,[6] 5) poor reporting and inadequate "follow-up contacts,"[7] 6) undetected, untreated or inadequately treated and asymptomatic cases.[6, 7, 9, 14]

The 70.9 percent of the total gonorrhea cases that were reported from urban areas was considerably higher than that from rural areas. This may be due to more accumulation of low socio-economic and various ethnic groups of population in the cities than in rural areas. Other factors appear to be the higher mobility of the population in urban areas than rural areas making control of gonorrhea more difficult,[4] and the accessibility to the public clinics, which afford better diagnosis and reporting systems.

The ratio of the Negro rate to the white rate was about 20:1 and to the Indian rate was about 4:1. The reason for such a high rate of 1687.1 cases per 100,000 population in Negroes could be due to the Negro use pattern in public clinics, which was the main source of reporting in this study. Also, some or all of the following factors may provide an additional partial explanation of this high rate: more Negro accumulation in the cities, more permissiveness in sexual matters,[13] and lack of information about VD.[6]

The trend of reported gonorrhea increased sharply among civilian males from 1965 to 1969. A slight decrease and variation in pattern of the trend of gonorrhea in the civilian female most likely is a reflection of the degree of reporting and case finding. The estimated ratio of reported gonorrhea cases of male to female was about 2:1 among civilian and 3:1 in both civilian and military

Table III

THE AGE DISTRIBUTION OF FIVE YEARS ACCUMULATED REPORTED GONORRHEA CASES BY SEX
OKLAHOMA, 1965-1969

AGE	CIVILIAN				MILITARY**	GRAND TOTAL	
	Male	Female	Unknown Sex	Total		Number	Percent
Under 1	1	7	0	8	0	8	*
1	0	4	0	4	0	4	*
2	1	6	0	7	0	7	*
3	0	3	0	3	0	3	*
4	0	4	0	4	0	4	*
Under 5	2	24	0	26	0	26	0.1
5 - 9	3	28	1	32	0	32	0.1
10 - 14	31	140	0	171	0	171	0.7
15 - 19	3,173	1,822	59	5,054	799	5,853	23.1
20 - 24	4,713	2,046	63	6,822	4,023	10,845	42.9
25 - 29	2,305	914	32	3,251	651	3,902	15.4
30 - 34	1,102	520	17	1,639	141	1,780	7.0
35 - 44	931	429	11	1,371	68	1,439	5.7
45 - 54	303	168	2	473	13	486	1.9
55 - 64	93	45	1	139	0	139	0.5
65 - 74	28	13	1	42	0	42	0.2
75 - 84	2	0	0	2	0	2	*
85+	1	0	0	1	0	1	*
Unknown	251	127	178	556	20	576	2.3
TOTAL	12,938	6,276	365	19,579	5,715	25,294	99.9

*Small number for calculation
**All male cases except 5 (i.e., 2 in 15-19 years; 1 in 20-24 years and 2 in 25-29 years of age).

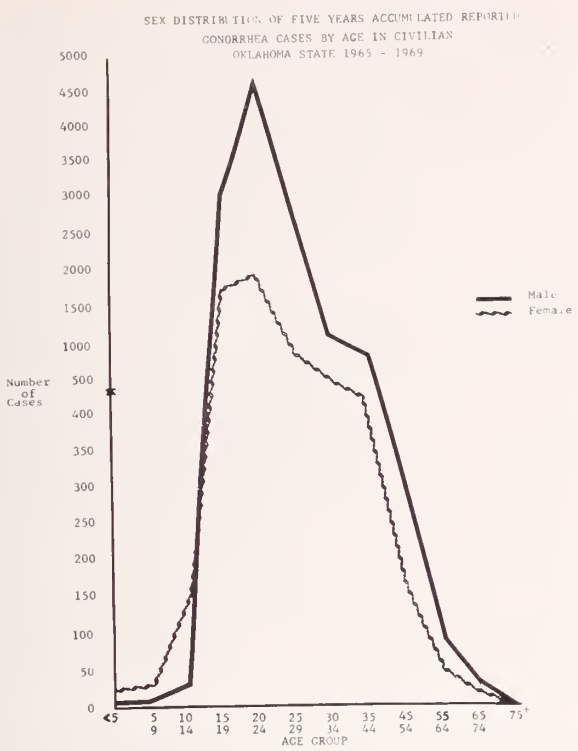


Figure 3

in Oklahoma in 1965-1969. Such a ratio was reported by many investigators.[15] The partial explanation for this may be among the following factors: Gonorrhea is usually more acute in the male than in the female,

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Table IV

THE VARIATION OF INCIDENCE OF REPORTED* GONORRHEA CASES FROM 1965 TO 1969 BY AGE IN MILITARY AND CIVILIAN POPULATION IN PERCENT IN OKLAHOMA

Age	Percentage of Variation of Incidence from 1965-1969 Civilian	Military
Under 5	0	No Case
5 - 9	0	No Case
10 - 14	+60.0	No Case
15 - 19	+92.7	+ 8.7
20 - 24	+67.3	—16.9
25 - 29	+28.2	— 7.7
30 - 34	—19.9	—48.4
35 - 44	—14.8	—35.7
45 - 54	—28.7	**
55 - 64	—18.5	No Case
65 - 74	—40.0	No Case
75 - 84	**	No Case
85 and Over	**	No Case
TOTAL	+43.3	—13.3

0 means no change
+ means increase from 1965 to 1969
— means decrease from 1965 to 1969
* Incidence of unknown age gonorrhea cases are not included
** Not enough for estimation

which causes him to seek medical care;[7] usually females demand that physicians keep their records confidential;[12] diagnosis of gonorrhea is more difficult in females than in males;[5] the possibility of protection of the gonococci which lie inside squamous or columnar epitheliel cells in the lower female genitourinary tract may cause failure of detection and complete cure in females.[7] Sometimes, penicillin may fail to penetrate abscesses of the cervical or vaginal glands; therefore, the problem in under-diagnosis, under-reporting and under-treatment is more pronounced in females than in males due to the more frequent asymptomatic nature of disease in the female.[5, 8, 14] The asymptomatic female reservoir of gonorrhea is a major contributing factor in the present prevalence and spread of gonorrhea.[2]

Although the main avenue of spread of gonorrhea is sexual contact, there was a possibility that the transmission of the disease to the infants of under age one year in this study could be related to birth canal contamination during the delivery process.[9] Records regarding the number of cases of gonorrheal ophthalmia and valvovaginitis are lacking. By and large, the overall age distribution pattern showed a remarkable

shift toward the younger age groups under 24 years. The largest increase in the reported gonorrhea cases was 92.7 percent in the age groups 15-19 from 1965 to 1969. This type of shift of incidence of gonorrhea toward the younger age group has been noted in the U.S. and also in some other countries.[2, 10, 11] The partial explanation for the increase of gonorrhea at younger ages may be the contribution of one, some or all of the following factors: broken family and dissatisfaction with home conditions,[10] poor parent/child relationship,[11] and overcrowded homes in more thickly populated and low socio-economic areas.[10, 11] Social studies show that sexual promiscuity is associated with separation from home, with a feeling of rootlessness, with emotional maladjustment and insecurity, all of which are more prevalent in younger groups.[11] More precocious sexual behavior was reported in children from homes where one or both of the parents were dead or absent.[10] The social attitude toward permissiveness in sexual matters and the indifference of the public has bearing on gonorrhea spread.[6] The frequency of intercourse, the number of partners and less fear of VD are associated with increased risk of contacting gonorrhea.[6, 10] Finally, the lack of proper education in matters of health and sex among the most vulnerable members of society, namely the young people, also contributes to the present prevalence of gonorrhea.[6, 9, 10, 11]

SUMMARY

The records of 25,294 reported gonorrhea cases in Oklahoma from 1965 to 1969 were reviewed. The secular trend of the cases increased from 1965 to 1969. The overall mean annual rate of reported gonorrhea cases was 202.2 per 100,000 population during the period of this study. The geographical distribution indicated that the median rate of the 77 counties in Oklahoma was 35.7 cases per 100,000 population in 1969, with high variability in the rates ranging from 0 to 426.5 among the counties. A majority of these cases were from urban areas in this study. The rate of 1687.1 cases per 100,000 population among Negroes was remarkably higher than for other races. There were three times more male cases than female. The age distribution of the cases was from under one to over 85 years of age, with the peak in the age group 20-24 years. There was considerable shift toward the younger age group of under 24 years. The largest increase in the reported gonorrhea was in the age group 15-19 in Oklahoma from 1965-1969. The relative lack of proper specific preventive measures and education in matters of sexual behavior and health among the most vulnerable members of society, namely the young people, low socio-economic groups and asymptomatic females contribute most to the increasing number of gonorrhea cases in Oklahoma in this study. By and large, there is an urgent need for development of satisfactory mass prevention and control measures.

ACKNOWLEDGEMENT

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800 N.E. 13th Street, Oklahoma City, Oklahoma 73104

Pascucci Names Councils and Committees

Lucien M. Pascucci, M.D., President of the Oklahoma State Medical Association, has released a tentative list of his appointments to the OSMA Councils and Committees.

Standing committees and councils are established in the OSMA Bylaws, while special committees are designated by the President to carry out specific functions under the jurisdiction of appropriate councils.

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AMA Launches New Communications Program

The American Medical Association is launching a special communications program in three national magazines and selected local media. Part of the effort will focus on better personal health care. Part will provide information on organized medicine's response to various national health care issues.

Present media plans call for six to eight full-page insertions in *Life*, the *Reader's Digest* and *Ebony* during the remainder of 1971, possibly ten insertions in major newspapers plus very limited exposure on television in a few cities. The budget currently provides for the expenditure of $750,000 in 1971 and a similar amount in 1972.

Of the three messages now being released for publication one, with the headline "How to Kill Yourself," warns of the dangers of being overweight, while pointing out that "over 70 percent of the AMA's annual budget goes for health and scientific information."

A second, on the subject of ecology, indicates that disease aggravated by environmental factors adds $38 billion to the nation's health bill. The third, speaking more specifically to national health issues, talks about the AMA's student loan program. Since 1962 the AMA, through voluntary contributions by individual physicians, has guaranteed $48 million worth of loans and helped 20,000 medical students, interns and residents to become practicing physicians. It also points out, in discussing the doctor shortage, that "While overall population has expanded 12 percent since 1960, the U.S. physician population has grown 28 percent."

The campaign was developed under the direction of the AMA Trustees' Committee on Communications, headed by John R. Kernodle, M.D., a practicing physician in Burlington, North Carolina and Vice-Chairman of the AMA's Board. □

Orient Adventure Ready for Oklahoma Physicians

A fourteen-day Orient adventure trip for members of the OSMA has been announced by the association's Board of Trustees. The tour will leave Oklahoma City on October 17th for two weeks in exotic Japan and Hong Kong.

Price of the trip package is $898 plus $35 tax and services. Regular round-trip economy fare from Oklahoma City to Hong Kong would be nearly $1,030 alone.

The fee for the OSMA Orient Adventure covers a round-trip transportation, deluxe hotels, two meals daily (an American breakfast in your hotel and gourmet dinners at a choice of the finest restaurants in the Orient), all tips, transfers and many other extras make the tour as enjoyable as possible.

Round trip transportation will be via World Airways 707 jet to Tokyo and Hong Kong. The jet features stretch out, extra comfort seating along with the finest food, champagne and complimentary cocktails.

There is absolutely no regimentation on the tour. Travelers are free to go where they want to go, and do what they want to do. The tour is being organized by the International Travel Advisors, Incorporated, known as INTRAV, from their main office in St. Louis.

In Tokyo travelers will stay in the beautiful New Otani Hotel, situated on ten acres of landscaped Japanese gardens. Tokyo is the world's largest city and is a bustling metropolis full of places to go, and things to do, such as shopping for oriental treasurers, silks, pearls and cameras, in the world famous Ginza.

The New Otani Hotel described as "practically a city in itself" is a fully air conditioned completely modern facility. It has ten restaurants serving Japanese, Chinese, Continental, and American dishes. Entertainment is furnished nightly in two restaurants and two bars. The world's largest cocktail bar, the Blue Sky Lounge on the seventeenth floor, has a view of all Tokyo.

While in Japan, travelers will have an opportunity to visit such beautiful and historic sites as Kyoto, via the fabulous "bullet express," the world's fastest train.

After the stay in Tokyo, the tour will depart for seven days in Hong Kong, the pearl of the Orient. Accommodations in Hong Kong will be in a hotel which Fortune magazine calls "one of the ten greatest hotels in the world," the magnificent Mandarin Hotel.

The hotel features 24 hour room service and has seven restaurants and bars. The Harbor Room Supper Club situated on the fourteenth floor commands a magnificent view of the harbor and city. Other restaurants include the elegant Chinese ManWah Room and the Mandarin Grill, a delightful grill room on the first floor.

Hong Kong is a city of shops, and shopping is one of the best reasons to go there. Travelers will find expert craftsmen of tailored fashion and footwear, craftsmen who can quickly turn out a suit or a pair of shoes to order.

Sightseeing in the new territories outside the city will take you back thousands of years where farming and walled villages still exist as in ancient times.

Intrav refers to their Orient Adventure as a "non-tour tour," because there is no regimentation. However, the company provides hosts to arrange sightseeing, shopping, golf, nightclubing and other activities for the travelers.

Physicians interested in the tour should contact the OSMA office immediately and make their reservations. □

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Cardiac Rehabilitation Center Now Open

A cardiac rehabilitation center has been established at Children's Convalescent Hospital in Bethany and is now accepting applications for testing. The purpose of this center is to furnish an evaluation service for physicians, employers, employees and social agencies.

Through tests given to cardiac patients a determination can be made as to the amount of physical stress the patient can safely tolerate. Such tests include treadmill exercise with electrocardiographic monitoring. In addition the patient will be examined by a cardiologist and will be interviewed by a social worker, a vocational counselor and a psychologist.

The stated purpose of the cardiac rehabilitation center is to help the patient get back to work in a job best suited to his particular combination of disabilities, talents and experience.

Although a fee will be charged, there will be a provision for reducing or eliminating the fee where indicated. In addition, such fee may be paid by insurance or by the referring social agency.

Findings of the cardiac rehabilitation center team will be sent to the referring physician and/or agency for further use in advising the patient. Where indicated, referral is made to appropriate agencies to carry through the recommendations of the team. The patient's private physician is invited to be present or to visit the facility at any time. A physician and emergency equipment are available at all times during the testing.

One of the most important functions of the center is to prevent the co-called "cardiac-cripple" attitude from developing in the cardiac patient. The results of a U.S. Department of Labor study indicate that the cardiac worker, when compared to the noncardiac worker, does just as well, and in some cases better, than their fellow workers. This is true of their rate of productivity, absenteeism, and industrial accident rate.

Most people with heart disease can do almost any kind of work for which they have the training and experience, and they can usually go back to their old jobs. The studies show that many types of work often considered "heavy" actually do not require any greater effort than that needed for routine activities of daily living.

For those patients needing help in financing this service, a referral should be made to the local vocational rehabilitation counselor who can, if the patient is eligible, provide not only the evaluation fee, but help with transportation, motel and food where necessary, because of the distance from the center.

For further information write Cardiac Rehabilitation Center, P.O. Box 888, Bethany, Oklahoma 73008 or call 789-2304 or 789-6711. □

DEATHS

FRED T. PERRY, M.D.
1908-1971

Fred T. Perry, M.D., Watonga physician, died last month. Doctor Perry came to Oklahoma from Canadian, Texas and was graduated from the University of Oklahoma School of Medicine in 1933. Before moving to Watonga in 1951, he practiced in Healdton, Craig, Colorado, and Okeene. In January of this year, Doctor Perry retired. He had recently been named an Honorary-Life member of the OSMA.

IRENE O. THOMAS, M.D.
1911-1971

Retired, Tulsa physician, Irene O. Thomas, M.D., died May 24th, 1971. A native of New York City, Doctor Thomas received her medical degree from the University of Michigan Medical School in 1936. Before moving to Tulsa seven years ago, Doctor Thomas practiced in Hawthorne, New Jersey, and Topeka, Kansas. She had served with the Navy Medical Corps during World War II.

THOMAS B. COULTER, M.D.
1879-1971

Tulsa urologist, Thomas B. Coulter, M.D., died April 20th, 1971. A native of Ohio, Doctor Coulter received his medical degree from the Medical College of Ohio in 1907. The following year he entered practice in Chickasha, Oklahoma. He came to Tulsa in 1916, where he retired in 1953.

In 1951, the OSMA presented Doctor Coulter with a Life Membership in recognition of years of service to his profession and humanity.

CECIL W. LEMON, M.D.
1903-1971

Cecil W. Lemon, M.D., Bryan County Health Officer, died May 26th, 1971, in Durant. Doctor Lemon graduated from the University of Oklahoma School of Medicine in 1931, where he later became an instructor in Anesthesiology. Following several years of practice in Oklahoma City, Doctor Lemon moved to Boliver, Tennessee. In 1963, he moved to Durant.

E. A. JOHNSON, M.D.
1880-1971

A Hugo physician since 1919, E. A. Johnson, M.D., died April 27th, 1971. Born in Brocksville, Alabama, Doctor Johnson received his medical degree from the Atlanta College of Physicians and Surgeons in 1910. He began his career in Atlanta, Georgia where he practiced until his service with the Armed Forces during World War I. Following the war, he moved to Hugo where he remained until his retirement last year.

Recognizing his outstanding service to humanity and the medical profession, the OSMA presented Doctor Johnson with an Honorary Life Membership in 1960. □

Proceedings of the 65th Annual Session of the House of Delegates of the Oklahoma State Medical Association

OPENING SESSION

I. CALL TO ORDER:

The House of Delegates convened its 65th Annual Session in the Fairmont-Mayo Hotel, Tulsa, Oklahoma on April 29th, 1971. The Speaker, Roger Reid, M.D., Ardmore, called the meeting to order at 7:10 p.m.

II. INVOCATION:

S. N. Stone, M.D., Oklahoma City, Vice-Speaker of the House, delivered the Invocation, followed by a few minutes of silence in tribute to the late Maxwell Johnson, M.D., Tulsa.

III. REPORT OF THE CREDENTIALS COMMITTEE:

The presence of a quorum was reported by C. Riley Strong, M.D., El Reno.

IV. ANNOUNCEMENTS:

Doctor Roger Reid announced the appointment of the following committees to assist in the conduct of the meeting:

Credentials Committee

C. Riley Strong, M.D., El Reno, Chairman
Ann K. Kent, M.D., Muskogee
A. C. Roberson, M.D., Anadarko
T. A. Ragan, M.D., Norman

Sergeants-at-Arms

Frank W. Clark, M.D., Ardmore, Chairman
Joe B. Jarman, M.D., Enid
Frank C. Lattimore, M.D., Kingfisher

Tellers

Richard H. Burgtorf, M.D., Shattuck, Chairman
John X. Blender, M.D., Cherokee
Arthur F. Elliott, M.D., Oklahoma City
Homer D. Hardy, M.D., Tulsa
David Ramsay, M.D., Ada

Reference Committee No. I

Elwood Herndon, M.D., Oklahoma City, Chairman
Robert D. Grubb, M.D., Tulsa
William M. Leebron, M.D., Elk City
Glen L. Berkenbile, M.D., Muskogee
Thomas C. Glasscock, M.D., Ponca City
Leon D. Combs, M.D., Shawnee
David Carson, M.D., Fairland
Robert R. Hillis, M.D., Lawton
Clifford Bassett, M.D., Cushing
Recording Secretary: Don Blair

Reference Committee No. II

Harlan Thomas, M.D., Tulsa, Chairman
William A. Matthey, M.D., Lawton
Alfred T. Baker, M.D., Durant
Tom S. Gafford, M.D., Muskogee
Robert L. Alexander, Jr., M.D., Okmulgee
Haven Mankin, M.D., Oklahoma City
R. W. Goen, M.D., Tulsa
M. S. Bartlett, M.D., Sapulpa
M. K. Braly, M.D., Woodward
John A. McIntyre, M.D., Enid
James V. Miller, M.D., Ardmore
Recording Secretary: David Bickham

Reference Committee No. III

Scott Hendren, M.D., Oklahoma City, Chairman
Marvin K. Margo, M.D., Oklahoma City
Robert Anderson, M.D., Tulsa
George M. Brown, M.D., McAlester
Robert J. Hogue, M.D., Guthrie
Roy W. Anderson, M.D., Cordell
E. L. Buford, M.D., Guymon
Roger Haglund, M.D., Tulsa
Lowell L. Templer, M.D., Altus
Recording Secretary: Ed Kelsay

Reference Committee No. IV

Malcom E. Phelps, M.D., El Reno, Chairman
Thomas Rhea, M.D., Idabel
Kent Braden, M.D., Oklahoma City
Charles C. Elliott, M.D., Okemah
Ross Deputy, M.D., Clinton
Francis R. First, M.D., Checotah
Orville Grigsby, M.D., Nowata
M. E. Robberson, M.D., Wynnewood
Recording Secretary: Betty Mahoney

V. INTRODUCTION OF GUESTS:

Mrs. William M. Leebron, Elk City, Retiring President of the Woman's Auxiliary to the Oklahoma State Medical Association; Mrs. E. Cotter Murray, Oklahoma City, Incoming President of the Woman's Auxiliary to the OSMA; Mrs. R. C. L. Robertson, Houston, President, Woman's Auxiliary to the American Medical Association; Mrs. Ramsay H. Moore, Dallas, President, Woman's Auxiliary to the Southern Medical Association and Mrs. Sue Conn, President, OU Chapter of the Student AMA were introduced and brought greetings to the House of Delegates. Mrs. Murray asked the physicians to urge their wives to join the auxiliary and strive for their goals of adult responsibility and membership for the coming year.

Doctor Ed L. Calhoon, OSMA President, introduced Doctor Leonard P. Eliel, Acting Executive Vice-President, University of Oklahoma Medical Center, and presented him with an AMA-ERF check in the amount of $11,477.07.

Doctor Eliel reported that this contribution was one of the largest in the country and that our state should be indeed proud. Doctor Eliel also gave a brief report on the Medical Center affairs. He stated that Oklahoma would have its first school of dentistry in 1972. He also stated that they have the largest ratio of dentists, nurses, aids and orderlies. He also reported that allied health personnel have a new school for health related professions. He said the total enrollment would increase by 20 percent at the first of next year. Doctor Eliel also commented that a new program on health care facilities was being built at this time.

Mrs. Evelyn Moore, President-Elect, Oklahoma Chapter of the American Association of Medical Assistants, brought greetings to the Delegates and urged all of the physicians to become aware of the program for medical assistants.

Floyd F. Miller, M.D., General Chairman, OSMA Annual Meeting Committee, stated that the Annual Meeting Report contained everything pertinent that he would have to say.

Doctor Stephen J. Adelson, Program Chairman, 1971 OSMA Annual Meeting, was introduced by Doctor Roger Reid.

R. LeRoy Carpenter, M.D., State Commissioner of Health, brought greetings to the House of Delegates and discussed briefly pollution and environmental health control, consumer protection and the upgrading of medical care in rural Oklahoma. Harry R. Hinton, Washington, D.C., Deputy Director, (Washington Public Affairs Division of the

(Continued on page 254)

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Medical Assistant Employment Service Available

An employment service for young men and women interested in working in physicians' offices is now being operated by the OSMA. Physicians in the greater Oklahoma City area can contact the OSMA and receive data sheets on these young people.

An experimental project, the medical assistant employment service is being conducted in cooperation with the Oklahoma Chapter of the American Medical Assistants Association. All schools in the Oklahoma City area that were training medical assistants, all hospitals, and physicians' offices, were notified that the association had the program. Young people interested in such work are asked to contact the association and are sent a "medical assistant data sheet" to fill out.

All of the personal data necessary to employ a person is asked for on the sheet. This includes educational qualifications, previous employers, whether or not the person is married, number of children, and whether or not arrangements for care of the children can be made.

Both personal and business references are asked for. The back of the data sheet specifies skills of the person, *i.e.*, laboratory experience, training and/or instruction in the giving of injections, typing, shorthand, bookkeeping, etc.

Physicians in the greater Oklahoma City area needing medical assistants may contact the OSMA for data sheets. The physician should specify whether he wants someone for front office, back office, or both, and what their educational qualifications should be. This information will then be used to eliminate the data sheets on persons not qualified for the job.

After the data sheets have been gathered on those persons qualified for the job, they are sent to the physician for his review. **The persons named on the sheets are not contacted by the OSMA.** Physician-employer will determine which of the people he is interested in and will contact them directly. □

National Concern Growing Over VD Increase

Infectious syphillis and gonorrhea is now pandemic in the United States according to a recent statement of the American Medical Association's Council on Environmental and Public Health. Gonorrhea ranks first and syphillis third among the reportable communicable diseases in the U.S.

According to the AMA Council, for the year ending June 30th, 1970, infectious syphillis rates were eight percent higher nationally than a year earlier. Thirty-three states showed an increase with some 70 to 80,000 cases reported. Unofficial estimates are that there are 250,000 cases of all forms of syphillis diagnosed and treated each year . . . most of which go unreported.

Gonorrhea morbidity for the fiscal year ending June 30th, 1970, exceeded 573,000 reported cases. Assuming that only about 25 percent of all cases are reported, gonorrhea is pandemic in the United States, with an estimated two million cases.

The AMA Council said, "Physicians in private practice treat approximately 80 percent of the syphillis and gonorrhea that comes to diagnosis but report to public health department only *one out of every eight cases of syphillis and one out of every nine cases of gonorrhea* they treat. Physicians should assist public health departments by reporting the VD cases they treat."

The Council's statement also urged medical societies to continue efforts for the enactment of state laws to permit physicians legally to treat VD cases of minors without obtaining parental consent. Such a law to allow Oklahoma physicians to do this very thing was passed by the Oklahoma legislature and signed by the Governor this year.

At the present time the State Medical Association is cooperating with the Oklahoma Department of Public Health in a statewide educational program for the general public on venereal disease. □

OMRF Seeks Thrombosis Patients

Because of the rare incidence of familial patterns of thrombosis, the Oklahoma Medical Research Foundation is seeking such patients for research purposes. They are also interested in patients with thrombotic tendencies associated with neoplastic disease. Physicians knowing of such cases are asked to contact James W. Hampton, M.D., OMRF, 825 N.E. 13th Street, Oklahoma City 73104. Phone 235-8331, ext. 7-317. □

Osteogenesis Imperfecta Foundation Formed

A charitable, non-profit and tax exempt foundation has been formed to initiate, encourage and offer support for research into osteogenesis imperfecta.

Even though the new organization was incorporated under the laws of the state of Georgia, it has chapters throughout the United States. Oklahoma's state chairman is Mrs. Charles Betzler, Sapulpa, Oklahoma.

The foundation is publishing a quarterly magazine entitled *Breakthrough.*

Aside from research, the main effort of the new foundation will be to acquaint the public with the problems of osteogenesis and seek support for programs to alleviate some of them. □

Resolution Received By *The Journal*

A tribute acknowledging the loss of the medical profession and the faculty of the University of Oklahoma School of Medicine by the death of one of its members has been received by *The Journal* from the Office of the Dean of the OU Medical Center.

A copy of the resolution honoring Joseph W. Funnell, M.D., Oklahoma City Obstetrician and Gynecologist, has been sent to Doctor Funnell's family with sympathy and a desire to share their mutual loss. □

Nursing Service Requirements Lowered For Rural Hospitals

A recent amendment to the Social Security Act modifies the nursing service requirements which an institution must meet in order to qualify as a hospital. The stated purpose of the legislation is to liberalize the nursing service requirements for certain small rural hospitals.

The amendment provides that until January 1st, 1976, the secretary of HEW is authorized to waive for any one-year period the requirement that a hospital must provide 24-hour nursing service rendered or supervised by a registered professional nurse. However, a registered nurse must be present on the premises to render or supervise the nursing service provided during the daytime shift, at least.

Three criteria are established for the secretary to use before he waives the requirement. He must find that—

(A) The hospital is located in a rural area and the supply of hospital services is not sufficient to meet the needs of individuals residing in the area.

(B) The failure of the hospital to qualify which seriously reduces the availability of such services to those individuals, and

(C) The hospital has made, and continues to make, a good faith effort to comply with the nursing service requirement, but compliance impeded by the lack of qualified nursing personnel in the area.

The waiver of the RN requirement will be granted on an annual basis for not more than one year at a time. At the end of each year the secretary must re-evaluate the situation in light of the three criteria stated above.

The secretary's waiver authority expires at the end of 1975. At that time Congress is expected to reaccess the situation, especially the supply of nursing personnel, and determine whether the waiver provision is still needed. □

Miscellaneous Advertisements

PHYSICIANS NEEDED: GP, pediatrician, obstetrician, for new six-physician clinic near expanding hospital in Edmond, Oklahoma. Rapidly growing suburban practice near Oklahoma City. Possible salary or partnership arrangement. Contact John L. Hackney, M.D., 120 North Bryant, Edmond, Oklahoma. 1-405-341-2233.

FOR SALE: Complete office furnishings including electrocardiogram equipment. Contact R. Q. Goodwin, M.D., 524-2061.

DILLON, COLORADO — Luxury condominum on lake, sleeps six, automatic kitchen, two bedrooms, two bathrooms, fireplace, magnificent view. Maid service. Ski Arapahoe, Keystone, Vail, Loveland and Breckenridge. Summer—fishing, sailing, pool, tennis. $60.00 nightly for six, less by week. S. C. Perceful, M.D., 3535 South Lafayette, Englewood, Colorado 80110. Phone 303 781-7824.

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1 PATIENT'S NAME | 2. ADDRESS

4 DIAGNOSIS (EXPLAIN COMPLICATIONS)

5 ADDITIONAL DIAGNOSES (CHRONIC DISEASE OF DEFECT FOUND DURING PRE

6 DATE OF ONSET | 7 DATE FIRST CONSULTED | 8 DUE TO PREGNANCY ☐ YES

11 SURGICAL OR OBSTETRICAL PROCEDURES (DESCRIBE)

12. IF HOSPITALIZED. NAME AND ADDRESS OF

15 NAME AND ADDRESS OF OTHER

COMPLETE IF PATIEN

16 TOTAL DISAP

FROM

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Proceedings

(Continued from Page 249)

American Medical Association, was introduced. Mr. Hinton discussed the great concern about national health care services and the expense of health care costs at the present time. He briefly discussed hospital and home care services.

Doctor Roger Reid introduced Kathy Musson and Betty Mahoney as the transcribing secretaries.

VI. REMARKS OF THE SPEAKER:

Doctor Reid read a letter of appreciation from Mrs. Ruth Hodgson on behalf of her late husband Doctor C. M. Hodgson.

VII. ANNOUNCEMENTS

Doctor Reid announced that the 1972 annual meeting will be held in Oklahoma City's Skirvin Hotel Convention Center, May 18th, 19th, 20th, 1972.

VIII. APPROVAL OF THE MINUTES:

The Speaker asked the pleasure of the House regarding the reading of the minutes of the last annual meeting.

Doctor Marvin Margo moved to dispense with reading the minutes and that they be approved as published in the Journal of the Oklahoma State Medical Association. The motion was seconded by David Carson, M.D., and it carried.

IX. RECESS FOR CAUCUS OF TRUSTEE DISTRICTS:

Doctor Reid announced the House would recess for ten minutes to allow Trustee Districts VI, VII, VIII, IX and X to caucus.

X. NOMINATIONS OF OFFICERS:

The House was declared open for the nominations of President-Elect (One-year term of office).

Stanley R. McCampbell, M.D., Oklahoma City, was nominated by James B. Eskridge, III, M.D.

Nominations were declared closed.

Nominations were declared open for the position of Vice-President (One-year term of office).

Robert J. Hogue, M.D., Guthrie, was nominated by James V. Miller, M.D., Ardmore.

Nominations were declared closed.

Nominations were declared open for the position of Delegate to the American Medical Association (Position I, two-year term of office).

Malcom E. Phelps, M.D., El Reno, was nominated by C. Riley Strong, M.D., El Reno.

Ed L. Calhoon, M.D., Beaver, was nominated by M. Joe Crosthwait, M.D., Midwest City.

Nominations were declared closed.

Nominations were declared open for the position of Alternate Delegate to the American Medical Association (Position I, two-year term of office).

Tom Points, M.D., Oklahoma City, was nominated by James B. Eskridge, III, M.D., Oklahoma City.

XI. NOMINATIONS OF TRUSTEES AND ALTERNATE TRUSTEES:

Nominations were declared open for Trustee and Alternate Trustee for the following Trustee Districts (three-year term of office):

DISTRICT VI.

Reporting on the Caucus of representatives from District VI, Doctor James B. Eskridge, III, made the following nominations:

Marvin K. Margo, M.D., Oklahoma City and *M. Joe Crosthwait, M.D.,* Midwest City, were nominated for the positions of Trustees and *Arnold Nelson, M.D.,* Midwest City and *John Devore, M.D.,* Oklahoma City, were nominated for the positions of Alternate Trustees.

DISTRICT VII.

Leon D. Combs, M.D., Shawnee, nominated *Jerold Kethley, M.D.,* Shawnee, for the position of Trustee and *Y. E. Parkhurst, M.D.,* Norman, for the position of Alternate Trustee.

DISTRICT VIII.

Doctor Roger V. Haglund, Tulsa, nominated *Paul A. Bischoff, M.D.,* Tulsa, and *Jack L. Richardson, M.D.,* Tulsa for the positions of Trustees and *William Benzing, M.D.,* Tulsa, and *Myra A. Peters, M.D.,* Tulsa, for the positions of Alternate Trustees.

DISTRICT IX.

Tom S. Gafford, M.D., Muskogee, nominated *Francis R. First, M.D.,* Checotah, for the position of Trustee and *Burdge Green, M.D.,* Stilwell, for the position of Alternate Trustee.

DISTRICT X.

George M. Brown, M.D., McAlester, nominated *Charles S. Cunningham, M.D.,* McAlester, for the position of Trustee and *Jack W. Parrish, M.D.,* Seminole, for the position of Alternate Trustee.

XII. REPORT OF THE PRESIDENT:

Doctor Ed L. Calhoon, gave his report and it was referred to Reference Committee No. I. (A copy of the report is attached and made a part of the minutes.)

XIII. REPORT OF THE BOARD OF TRUSTEES:

C. Riley Strong, M.D., Chairman, Board of Trustees, read the Board of Trustees Report and the Board's Supplemental Report. Both reports were referred to Reference Committee No. I. (Copies of the reports are attached and made a part of the minutes.)

XIV. REPORT OF THE SECRETARY-TREASURER:

Stanley R. McCampbell, M.D., Secretary-Treasurer, reviewed his report and it was referred to Reference Committee No. I. (A copy of the report is attached and made a part of the minutes.)

XV. COUNCIL AND COMMITTEE REPORTS:

The Speaker stated that the House of Delegates received the following reports and they are referred to the designated reference committees. (Copies of the reports are attached and made a part of the minutes.)

Committee on Planning, Hillard E. Denyer, M.D., Chairman, referred to Reference Committee No. I.

Annual Meeting Committee, Floyd F. Miller, M.D., Chairman, referred to Reference Committee No. II.

Financial Aid to Education Committee, Hillard E. Denyer, M.D., Chairman, referred to Reference Committee No. I.

Foundation for Peer Review Study Committee, Hillard E. Denyer, M.D., Chairman, referred to Reference Committee No. II.

Medical School Liaison Committee, Harold W. Calhoon, M.D., Chairman, referred to Reference Committee No. III.

Constitution and Bylaws Committee, George H. Garrison, M.D., Chairman, referred to Reference Committee No. I.

Council on Insurance, Jack D. Fetzer, M.D., Chairman, referred to Reference Committee No. IV.

Council on Professional Education, Robert J. Hogue, Jr., M.D., Chairman, referred to Reference Committee No. II.

Council on Professional and Intervocational Relations, Orange M. Welborn, M.D., Chairman, referred to Reference Committee No. III.

Council on Public Health, Hayden H. Donahue, M.D., Chairman, referred to Reference Committee No. IV.

Council on Public Policy, Rex E. Kenyon, M.D., Chairman, referred to Reference Committee No. II.

Council on Socio-Economic Activities, B. C. Chatham, M.D., Chairman, referred to Reference Committee No. III.

XVI. INTRODUCTION OF RESOLUTIONS:

The Speaker announced that Resolutions Numbers 1 through 14 would be introduced by "Title" and "Resolve," referred to the appropriate reference committees and acted upon in the Closing Session of the House of Delegates:

Resolution No. 1, entitled "Voluntary AMA Membership" was introduced by Robert H. Johnson, *et al.,* and referred to Reference Committee No. I.

Resolution No. 2, entitled "Amending the Bylaws . . ." was introduced by Tulsa County, and was referred to Reference Committee No. I.

Resolution No. 3, entitled "Voluntary AMA Membership" was introduced by Carter-Love-Marshall Society and was referred to Reference Committee No. I.

Resolution No. 4, entitled "Voluntary AMA Membership" was introduced by Lincoln County, and was referred to Reference Committee No. I.

Resolution No. 5, entitled "Formation of a Union or Guild" was introduced by the Okfuskee County, and was referred to Reference Committee No. I.

Resolution No. 6, entitled "Formation of a Union or Guild" was introduced by the Okfuskee County, and was referred to Reference Committee No. 1.

Resolution No. 7, entitled "Medical School Admissions Committee" was introduced by the Medical School Liaison Committee, and was referred to Reference Committee No. I.

Resolution No. 8, entitled "Audit of Hospital Records" was introduced by Oklahoma County, and was referred to Reference Committee No. III.

Resolution No. 9, entitled "Labeling of Medications" was introduced by the Oklahoma County, and was referred to Reference Committee No. II.

Resolution No. 10, entitled "Opposition to Professional Services Review" was introduced by the Oklahoma County Medical Society, and was referred to Reference Committee No. II.

Resolution No. 11, entitled "Impowering the Board of Trustees to negotiate with AMA to bring about a change in policies, reporting the results of such negotiation and recommendations pursuant to mandatory or voluntary AMA membership" was introduced by the Oklahoma County Medical Society, and was referred to Reference Committee No. I.

Resolution No. 12, entitled "Financial Aid to Medical Students" was introduced by the Oklahoma County Medical Society, and was referred to Reference Committee No. I.

Resolution No. 13, entitled "Relations with the Department of Public Welfare" was introduced by Robert J. Hogue, Jr., M.D., and was referred to Reference Committee No. III.

Resolution No. 14, entitled "Blue Shield UCR Program" was introduced by Robert J. Hogue, Jr., M.D., and was referred to Reference Committee No. II.

Reference Committee Meetings:

The Speaker urged all members of the OSMA to attend the Reference Committee Hearings, and announced the following meeting areas in the Tulsa Assembly Center:

Reference Committee I—Room C
Reference Committee II—Room E
Reference Committee III—Room H
Reference Committee IV—Room J

XVII. NECROLOGY REPORT:

S. N. Stone, M.D., Vice-Speaker, read the Necrology Report. (A copy of the report is attached and made a part of the minutes.)

XVIII. EXECUTIVE SESSION:

The Speaker called an executive session as Doctor R. Barton Carl read a report on legislative matters. Copies of Senate Joint Resolution No. 26 and reports from the Oklahoma State Regents for Higher Education were passed out to the Delegates.

XIX. ADJOURNMENT OF OPENING SESSION:

The Opening Session of the House of Delegates was adjourned at 9:55 p.m.

CLOSING SESSION

I. CALL TO ORDER:

The Closing Session of the 65th Annual Meeting of the House of Delegates was called to order by the Speaker, Roger J. Reid, M.D., at 9:10 a.m., May 1st, 1971, in the Tulsa Assembly Center, Tulsa, Oklahoma.

II. REPORT OF THE CREDENTIALS COMMITTEE:

C. Riley Strong, M.D., Chairman of the Credentials Committee, announced a quorum present.

III. ANNOUNCEMENTS:

Doctor Reid urged everyone to attend the 1:00 p.m. meeting with Eugene F. Balangero, M.D., Montreal, Canada, as guest speaker. His topic, "Experience of Canadian Physicians with Government Controlled Medicine," should be of interest to every physician.

Doctor Scott Hendren requested that the House of Delegates recognize the loss of Maxwell Johnson, M.D., as an outstanding member of the association and to have a plaque presented to Mrs. Johnson in his memory.

Doctor Reid annouced the Tellers:

Richard Burgtorf, M.D., Shattuck, Chairman
Arthur F. Elliott, M.D., Oklahoma City
Homer D. Hardy, M.D., Tulsa
David Ramsay, M.D., Ada
John X. Blender, M.D., Cherokee

IV. REPORTS OF REFERENCE COMMITTEES:

All reports considered by the House of Delegates are attached as approved and made a part of these minutes.

Report of Reference Committee No. I

Presented by: Elwood Herndon, M.D., Oklahoma City, Chairman.

Mr. Speaker and Members of the House of Delegates, your reference committee gave careful consideration to the items referred to it and makes the following recommendations.

Item I. Resolution No. 7.

Your committee agrees with the intent of this resolution. It is recommended, however, that in the third "WHEREAS" the word "limited" be substituted for the word "no." Moreover, it is recommended that the following statement be added to the end of the resolution and made a part thereof: "BE IT FURTHER RESOLVED, that nine

representatives of the Oklahoma State Medical Association be added to the Admissions Committee as presently constituted."

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item II. Resolutions No. 5 and No. 6.

Your committee recommends disapproval of these resolutions.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item III. Resolution No. 12.

Your committee recommends approval of this resolution.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item IV. Report of the Committee on Planning.

Your committee recommends approval of this report.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item V. Report of the Financial Aid to Education Committee.

Your committee recommends approval of this report.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item VI. Report of the Secretary-Treasurer.

Your committee recommends approval of this report.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item VII. Board of Trustees Report (and Supplemental Report).

Your committee recommends approval of this report.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item VIII. Report of the President.

Your committee recommends approval of this report, and on the behalf of the entire medical profession, the committee extends its sincere appreciation for the splendid representation provided by Doctor Calhoon during his term of office.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item IX. Resolutions No. 1-4.

Since these four resolutions are all concerned with the subject of required membership in the AMA, your committee considered them as a unit. Your committee feels that maximum support should be given to the American Medical Association during this critical period in the history of medicine. Therefore, your committee recommends disapproval of these resolutions.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item X. Resolution No. 11.

Your committee recommends approval of this resolution.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item XI. Report of the Constitution and Bylaws Committee.

Regarding recommendation number 1 (to change the name of the Medical School Liaison Committee), your committee recommends approval.

Regarding recommendation number 2 (to permit OSMA membership for physicians who have filed a declaration of intent to become citizens), your committee recommends approval.

Because your committee has recommended that resolutions No. 1-4 be rejected, no action is required on recommendations number 3 and 4 of the Report of the Constitution and Bylaws Committee. However, should the House of Delegates decide against the recommendation of your committee, caution should be taken to adhere to the special amendments contained in recommendation number 3, and it will be necessary for the county medical societies to amend their bylaws as suggested in recommendation number 4.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Mr. Speaker, I move the adoption of this report as a whole. The motion was seconded and it carried.

Report of Reference Committee No. II.

Presented by: Harlan Thomas, M.D., Tulsa, Chairman.

Mr. Speaker and Members of the House of Delegates, your reference committee gave careful consideration to the items referred to it and makes the following report:

Item I. Report of the Annual Meeting Committee.

The committee wishes to commend the members of the Annual Meeting Committee and its Chairman, Doctor Floyd F. Miller for the excellent program of the 1971 Annual Meeting. Your reference committee would like to bring to the attention of the House of Delegates that the Board of Trustees has directed the Planning Committee to make an in depth study of the future and purpose of annual meetings.

The committee recommends the approval of this report.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item II. Report of the Council on Professional Education.

Mr. Speaker, your committee considered each recommendation of this report.

The committee recommends approval of recommendation No. 1 as written.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Your committee recommends the approval of recommendation No. 2 and would like to emphasize to association members that the AMA Recognition Award Program is a *voluntary* program and urges all members to participate.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Your committee approves recommendation No. 3 with the understanding that this seminar be a "no host seminar."

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Your committee approves recommendation No. 4.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item III. Resolution No. 9.

(Labeling of Medications—submitted by the Oklahoma County Medical Society.)

The committee recommends adoption of this resolution.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item IV. Resolution No. 14.

(Blue Shield UCR Program—submitted by Robert Hogue, Jr., M.D.)

Mr. Speaker your committee heard lengthy testimony regarding Resolution No. 14. Problems that may arise as a result of implementing

the "resolve" of this resolution were discussed fully. However, the committee feels that health insurance is a contract between the insurer and the insured and while it is a concern of the physician, he should not be bound by a contract to which he is not a party. The committee feels that previous action taken in 1969 by the Prepaid Medical Insurance Committee and by this House of Delegates in 1970 as stated in the resolution, affirms the position of Medicine regarding this matter.

Your committee recommends adoption of Resolution No. 14.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item V. Resolution No. 10.

(Opposition to "Professional Services Review" — Oklahoma County Medical Society.)

Mr. Speaker, your committee considered resolution No. 10 and the Report of the Foundation for Peer Review Study Committee together.

While Resolution No. 10 has admirable purpose the intent of the resolution is covered in the report of the Study Committee and since there is no conflict between Resolution No. 10 and the Study Committee Report, your committee recommends "no action" be taken on Resolution No. 10.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item VI. Foundation for Peer Review.

Mr. Speaker, the subject of Peer Review is a matter of great concern to Oklahoma Physicians. Your committee heard several members of this association speak strongly on various aspects of this issue. Throughout the testimony your committee heard again and again that Peer Review should be done by practicing physicians who are truly "peers." Your committee agrees.

The committee commends the physicians who served on this study committee for their excellent work and outstanding report and heartily recommends its approval. Your committee concurs in action taken by the Board of Trustees regarding this report and would like to place a special emphasis on expedient action for the implementation of a Foundation for Peer Review, consisting of Oklahoma Physicians, to serve Oklahoma Physicians.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item VII. Report of the Council on Public Policy.

Mr. Speaker your committee considered the report of the Council on Public Policy by sections. The committee recommends approval of Section 1, the report of the Council.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Section No. 2. State Legislative Committee Report.

Mr. Speaker, your committee recommends the adoption of this report and approval of the position taken by the committee on the specific legislation listed in the report.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Section No. 3. Public Relations Committee.

Your committee recommends approval of this report.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Section No. 4. Medical Heritage Committee.

Your committee recommends approval of this section of the report.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Mr. Speaker, your chairman wishes to thank the members of Reference Committee No. II and moves adoption of this report as a whole. The motion was seconded and it carried.

Report of Reference Committee No. III.

Presented by: Scott Hendren, M.D., Oklahoma City, Chairman.

Mr. Speaker and Members of the House of Delegates, your reference committee gave careful consideration to the items referred to it and makes the following recommendations.

Item I. Medical School Liaison Committee.

The committee recommends the approval of recommendation number 1 under this report and that recommendations numbers 2 and 3 be combined and read as follows: "2. It is recommended that the OSMA offer to submit a slate of nominees for positions on the Medical School Committee on Admissions. The nominees would be selected by the OSMA Board of Trustees and must pledge to serve actively on the committee before their name is officially submitted. It is understood that membership on the committee is selected by the OU Medical School faculty. The slate of nominees should be presented to the faculty with the OSMA recommendation.

"It is further recommended that medical students be allowed to serve on the Committee on Admissions in an advisory capacity only. And further it is recommended that the present ratio of full-time faculty and practicing physicians on the committee be maintained.

"3. It is recommended that consideration be given to develop a method for more active participation of physicians from over the state on the Committee on Admissions."

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item II. Report of the Council on Professional and Intervocational Relations.

The committee recommends the approval of this report in its entirety.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item III. Council on Socio-Economic Activities.

The committee recommends the approval of this report in its entirety.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item IV. Resolution No. 8.

The committee is sympathetic to the concerns expressed in this resolution, but feels that a policy statement by OSMA would better serve the intended purpose. The policy statement to read as follows: "OSMA remains on record in opposition to other than clerical auditing by lay people.

"The review of medical records regarding the appropriateness, medical necessity, quality of medical services or the appropriateness of fees remains a peer review function to be performed only by physicians who may refer to the OSMA peer review committee when indicated."

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item V. Resolution No. 13.

The committee believes that the resolves of this resolution should be changed to read as follows: "NOW, THEREFORE, BE IT RESOLVED that the President of the OSMA designate a committee to try to work out a solution to this problem and if at the end of the three month period this solution has not been found, the committee is directed to take this grievance to the Bureau of Health Insurance and our representatives in Congress in an effort to find a method to gain reasonable cooperation from the Department of Public Welfare.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Doctor Scott Hendren asked for discussion on Resolution No. 13. He stated that he believed Resolution No. 13 was a bad resolution. He stated that it would be placing on our incoming president a difficult and almost impossible job.

A verbal vote was taken on the resolution and it was at first determined that the vote was "NO."

Doctor Hogue asked to speak. He stated that the reference committee has already discussed this resolution and voted in favor of it. Some discussion about the Welfare Department's reluctance to cooperate with the medical review committee took place.

There was some discussion as to what had been voted on and the Speaker made it concise. He stated that the vote was on Item 5, Resolution 13 as amended.

A standing vote was taken with 62 in favor and 28 against. Item number 5 was therefore adopted.

Mr. Speaker, I move the adoption of this report as a whole. The motion was seconded and it carried.

Report of Reference Committee No. IV.

Presented by: Malcom E. Phelps, M.D., El Reno, Chairman.

Mr. Speaker and Members of the House of Delegates, your reference committee gave careful consideration to the items referred to it and makes the following report.

Item I. Disability Income Program.

Mr. Speaker, your committee feels that the Disability Income Program is serving a valuable purpose for members of this association. The fact there has been no increase in premium rates since 1961 and that no increase in premiums is contemplated at this time, is commendable, and an excellent commentary on the Insurance Company of North America and C. L. Frates Company, administrators of the plan.

Mr. Speaker, I move adoption of this portion of the report. The motion was seconded and it carried.

Section II. Overhead Expense Program.

Mr. Speaker, your committee recommends adoption of this portion of the report. The motion was seconded and it carried.

Section III. Professional Liability Program.

Mr. Speaker, your committee would like for the House of Delegates to take special note of the report on the Professional Liability Insurance Program. Because of an effective claims prevention program and relatively few losses, association members purchase this insurance at about one-half the rates of competitive companies. Sixty percent of the physicians of Oklahoma are covered by this policy which speaks well for our support of the program. The reference committee urges the Council on Insurance to continue the claims prevention program that has been so successful in past years. It behooves every member of the association to be extremely vigilent in malpractice prevention and since our loss ratio stands 39th nationally, there may be a possible premium reduction.

Mr. Speaker, I move adoption of this portion of the report. The motion was seconded and it carried.

Section IV. Excess Limits Liability Program.

Mr. Speaker, I move adoption of this portion of the report. The motion was seconded and it carried.

Section V. Group Term Life Insurance.

Due to losses from claims and administrative costs, the group life insurance program has been altered to a level term plan. The new program provides for increased benefits and a lower cost per $1,000 will probably be realized when compared with the former plan.

Mr. Speaker, I recommend adoption of this portion of the report. The motion was seconded and it carried.

Mr. Speaker, your reference committee would like to express its appreciation to Mr. Rod Frates of the the C. L. Frates Company for explaining many of the ramifications of the insurance program of the Oklahoma State Medical Association. Your committee wishes to extend its most sincere thanks for his valuable expertise.

Your committee would also like to express its appreciation to the association's Council on Insurance for monitoring our insurance programs and feels that they should be commended for their untiring efforts on behalf of us all.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Item II. Council on Public Health.

Mr. Speaker, your committee considered this report by section.

Section I. Introduction.

Regarding the introductory comments of the council report, your reference committee would like to make the following observations and recommendations:

Mr. Speaker, your reference committee feels that since many programs have been implemented at the national level regarding smoking and health that the Interagency Council on Smoking and Health should seek funds from other sources than the medical association.

(Doctor Harvey spoke for Doctor Hayden Donahue on the Interagency Council on Smoking and Health. He asked for support from the OSMA. He stated that the program would probably be discontinued without the support from the medical association.)

(Doctor Strong, Chairman of the Board of Trustees, stated that the Board turned down support of this program. A vote was taken and the report was adopted.)

Since restrictions on ambulance companies may diminish their willingness to provide services and since acceptable and competent attendance is available, the committee recommends that no severe requirements be imposed on these operators at this time.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Pollution and environmental control programs to be worthwhile need the guidance of physicians. Your reference committee would recommend that all members of this association take an active role in monitoring and guiding some of the programs at the local level.

Mr. Speaker, I move adoption of this portion of the report. The motion was seconded and it carried.

If the White House Conference on Aging follows the pattern set by past conferences, it will be dominated by persons with philosophies who will adopt recommendations embracing social concepts which we feel are not held by the people of Oklahoma.

Your reference committee urges that knowledgeable physicians be appointed to represent the association in order to offset these extremely liberal views.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Section II. Committee on Alcoholism and Drug Abuse.

Mr. Speaker, your reference committee would like to commend the committee on Alcoholism and Drug Abuse for the seminars that were conducted on drug abuse. Your committee feels that the drug abuse manual prepared by the committee and distributed to Oklahoma physicians is an excellent aid and recommends that the committee periodically update the manual and that physicians continue their study in this important area.

Your reference committee also feels that in addition to education for physicians, that the committee might consider drug abuse programs for elementary and secondary school children.

We recommend approval of the Report of the Committee on Alcoholism and Drug Abuse.

Mr. Speaker, I move adoption of this portion of the report. The motion was seconded and it carried.

Section III. Disease Screening Committee.

Mr. Speaker, your committee recommends approval of this report. However details need to be investigated and evaluated before we can recommend general acceptance of multi-phasic screening programs. Your committee does recommend that the activities of this committee be continued and that they report to the association at each annual session.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Section IV. Committee on Immunization.

Mr. Speaker, your committee recommends approval of the Report of the Immunization Committee with this recommendation:

That the committee include in its program tuberculin testing.

Your reference committee and the association members should highly commend the members of this committee for their outstanding efforts in immunization programs.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Section V. Committee on Laboratory Quality.

Mr. Speaker, your reference committee recommends approval of the Committee on Laboratory Quality Report and wishes to extend its appreciation to its members for their outstanding efforts in this area. We would also like to congratulate those physicians who are enrolled in the Laboratory Quality program and encourage others to participate in hopes that voluntary participation will forestall legislative intervention.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Section VI. Maternal Mortality Committee.

Mr. Speaker, your committee recommends approval of the Report of the Maternal Mortality Committee and commends its members for their studious review of the maternal death rates of this state. We would also take special note of the fact that only 76.6 percent of the physicians from whom information was requested responded. Your committee urges our members to cooperate with this committee.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

Section VII. Council on Rural Health.

Mr. Speaker, your reference committee spent considerable time on the Report of the Council on Rural Health. While we commend the Council and its members for their efforts, your reference committee views the loss of physicians from our rural areas as the major concern of medicine. The fact that during the last ten years, 39 of our counties lost population at 8.3 percent is alarming. But during the same period, our physician population in communities of under 5,000 dwindled to only 239—a loss of 33 percent. This critical problem will continue unless drastic changes are made in a number of factors, such as: medical education and the overall economic picture. Your committee has noted that Doctor Kelly West from the OU Medical Center was employed to conduct a survey in a specific area of the state to define a medical service area, to analyze its existing medical resources and to assess its future needs. It is envisioned that if this survey proves successful and economically feasible, then it will be used as a model for future surveys. This committee would like to remind the council that similar surveys have been conducted by the Sears Foundation in many areas in this country and that the resources of this organization may be useful to the council. The committee would like to recommend to the council that in any survey on the problems of rural health that the majority of the input should be provided by physicians who are knowledgeable about the problems of medicine in rural areas.

It is recalled that the reference committee at the last annual meeting recommended additional physicians from the rural areas be represented on the council. We note that this has not been done and recommend that this suggestion be followed.

Your reference committee realizes that great strides in family medicine have been made in the OU Medical School in the past few years. However, the support of the department and the philosophy of family practice is not supported by the majority of the faculty in the school. This attitude has contributed to the failure of training physicians interested in family practice in the rural communities.

Your reference committee also feels that more practicing physicians, particularly from non-urban areas should have an active role

in the selection of future medical students and that there should be liaison between the medical school and its faculty and physicians in rural communities. Your committee feels strongly that practicing physicians from the rural areas could more competently serve on the admissions board than students.

Your reference committee also feels that the Oklahoma Legislature will be more generous with the medical center when it is confident that physicians will be produced who can and will take care of their constituents.

Your committee recommends that the Council on Rural Health be continued but that the representation on this council be changed to provide for more physicians who are in active practice in rural areas and are aware of the needs and problems of the rural areas.

The reference committee recognizes and appreciates the considerable effort that the Council on Rural Health has expended in preparing this report. We hope that the recommendations and suggestions made by this committee will be well received and useful in making their efforts more productive.

Mr. Speaker, I move the adoption of this portion of the report. The motion was seconded and it carried.

The chairman would like to express his sincere appreciation to the members of this committee who worked long and hard in preparing this report and especially to Miss Betty Mahoney, our recording secretary.

Mr. Speaker, I move the adoption of this report as a whole. The motion was seconded and it carried.

Doctor Tom Points asked to make a point of information about Resolution No. 13. He urged the association to pursue all avenues possible. He stated that BHI does have something to do with Medicare but it is not the only department that should be contacted.

Doctor Robert Hogue made a motion:

I move that the committee as delegated by the President take this information under advisement and take all avenues to finding a solution to this problem. The motion was seconded and it carried.

Doctor Malcom Phelps made a substitute motion to "Ask Doctor Points where to go to find the solution." This was seconded by Doctor Robinson. He asked that the phrase "other appropriate agencies" be inserted into the resolution. This motion was not passed.

Haven W. Mankin, M.D., was announced as the new Secretary-Treasurer to succeed Doctor Stanley R. McCampbell, newly elected President-Elect.

V. OLD BUSINESS:

Doctor Richardson stated that he felt obligated to present one point of discussion before the body dispersed. He referred to Reference Committee No. I and the resolutions dealing with compulsory membership in the AMA. He stated that we should give our full support to the AMA, but he objected to compulsion and he likened the policy to a closed shop.

Doctor Malcom Phelps stated that action had been taken on this resolution by the reference committee and that these remarks are out of order at this time.

Doctor Richardson stated that his plea was that considerable thought be taken on this matter.

Francis W. Hollingsworth, M.D., El Reno, stated that the OSMA should be very proud of Doctor Malcom Phelps who has served for many years as a Delegate to the AMA and that Doctor Phelps should be rewarded in the appropriate fashion they deem necessary. Doctor Phelps said no action by the House of Delegates was necessary.

Doctor David Carson spoke briefly on the subject of encouraging young physicians to go to rural areas.

VI. NEW BUSINESS:

Dick Loy, M.D., stated that the Council on Insurance should prepare for the upcoming fee schedule and should have some type of standard fee schedule prepared.

The motion was made to set up a committee to study the feasibility of the standard fee schedule. The motion was seconded and it carried.

VII. ADJOURNMENT:

The 65th Annual meeting of the House of Delegates was adjourned at 10:35 a.m.

Recorded by Betty Mahoney

Resolution No. 7.
(APPROVED AS AMENDED)

SUBMITTED BY: Medical School Liaison Committee

TITLE: O.U. Medical School Admissions Committee

REFERRED TO: Reference Committee No. 1

WHEREAS, it has come to the attention of your association that senior medical students are serving as full members of the O.U. Medical School Committee on Admissions; and

WHEREAS, of the committee's twenty-six members, nine are senior medical students, nine are fulltime faculty members, and only eight are part-time faculty members in private practice; and

WHEREAS, said fourth year medical students having never practiced the art of medicine have limited basis from which to make a value judgement about another student's potential to become a physician,

NOW THEREFORE BE IT RESOLVED, that we, the members of the House of Delegates, recommend that medical students be allowed to serve only in an advisory capacity on the Committee on Admissions of the O.U. Medical School.

BE IT FURTHER RESOLVED, that nine representatives of the Oklahoma State Medical Association be added to the Admissions Committee as presently constituted.

Resolution No. 5.
(DISAPPROVED)

SUBMITTED BY: Okfuskee County Medical Society

TITLE: Formation of a Union or Guild

REFERRED TO: Reference Committee No. I

There have been extensive and increasing intrusions into and trespasses against the practice of medicine and encroachments and supervention in the physician-patient relationship that has been treasured by both physicians and patients since the beginning of ethical and scientific practice of medicine and surgery.

The medical profession as a whole and its individual members have been under increasing slanderous malignment, harassment, coercion and intimidation and restriction regarding its concern for the quality and quantity of patient care, the quality and training and quantity production of its own members and its utilization, for the benefit of its

patients, of various health facilities and various health programs such as Medicare and Medicaid, and its utilization of various good and valuable medications and or treatment programs.

These intruders include such individuals as Ralph Nader, and various other writers, many politically motivated Senators and Congressmen, various labor union bodies such as the CIO, the AFL, and the United Auto Workers and the Teamsters Union.

They also include violent anarchical and revolutionary groups such as the Black Panthers and various Puerto Rican street gangs in New York and various other revolutionary "social welfare" groups.

They include such health insurance carriers as Blue Cross and Blue Shield and other private insurance concerns and also dollar-provider-purveyors of health benefits such as the Federal Medicare and Medicaid programs and the Welfare and Medicaid programs of the various 50 states.

They include the IRS, the FDA, the United States Congress and Senate.

They include various attorney-groups devoted and dedicated to the instigation and prosecution of malpractice suits.

From the earliest beginnings the Medical Profession and its individual members have policed and disciplined themselves, have constantly pursued scientific knowledge, pursued investigative and initiative research, improved the training of its members, improved its research procedures, improved its laboratory, surgical, and diagnostic and radiologic instrumentations, improved its practice of the art and science of medicine, and with a solicitude for the physical, mental, economic, moral, and ethical well being of its patients to a degree unmatched by any other segment of society or by society as a whole. The Medical Profession need not apologize for itself. It is time that the Medical Profession quit apologizing.

The Okfuskee County Medical Society therefore makes a formal motion that the Oklahoma State Medical Association either convert itself or form a parallel organization to form the Oklahoma State Union (or Guild) (or other appropriate term) of Medical Doctors for the purpose of representing its members as their agent in any necessity for collective bargaining that might arise and or any negotiation that might be necessary with various third parties. It is moved that this new organization be structured along the lines of various industrial labor unions and organizations and that all necessary and desirable legal requirements be built into the constitution and bylaws of this organization. It is moved that the various County Medical Societies form local Unions (or Guilds) as subparties to the parent organization. It is also moved that this State Organization be formed with such a legal structure and with such a constitution and bylaws that it can become the state representative of a larger parent organization to be formed by the members of the American Medical Association into a National Union or Guild of Medical Doctors and that a description of its intentions and structure be forwarded to the American Medical Association and that the United States Medical Doctors or that the membership of the American Medical Association be transferred also into such a Union-type Association, Guild, or Union paralleling the present American Medical Association.

This motion would of course include the recommendation that the National Union, Guild, or Association of the United States M.D.'s be formed and structured for the purpose of representing and negotiating for its members in any dispute or argument or negotiation and/or to initiate such negotiations in behalf of its members with various third parties when indications arise.

It is recommended that a special session of the American Medical Association for its necessary committees be convened to consider this move. It is recommended that the resultant recommendations of the American Medical Association then be made known to its variius component members or component State Societies and the County Societies of the various 50 States for their action to implement this program and that such State Union-type Societies then be known as the "State-Name" Division of the National Guild, (Union, or Association) and that the County Societies be designated as the "County-Name," Local Guild, Union, Association, or Society of the "State-Name" Division of the National Organization (whatever its name may end up being).

It is further recommended that the Oklahoma State Medical Association through its executive committee call the necessary committees into special session to consider and make such modifications of the present motion as are desirable or necessary and then pass this motion. It is felt that it would be most desirable to have the new National and State and Local Societies as organizations *parallel* to and made of the same membership but legally and structurally *distinct* from the American Medical Association and its component societies *per se*.

Charles A. Cashman, M.D., Inc.
General Practice & Surgery
Box 226
Okemah, Oklahoma 74859
Telephone 918-623-1177
March 23, 1971

Don Blair
Executive Director
Oklahoma State Medical Association
601 Northwest Expressway
Oklahoma City, Oklahoma 73118

Dear Don:

"The penalty that good men pay for indifference to public affairs is to be ruled by civil men." (Plato)

"Historians of the future will marvel most of all at the non-resistence of those who had the most to lose." (General George Van Horn Mosely, commenting on the decline of the Republic of the United States.)

Thank you for your letter of 15 March 1971 a copy of which is enclosed for your convenient reference. First let me clarify the matter of the origin of the resolution. I wrote the original letter and submitted it to our local society and it was approved to be submitted to the State Society as read. The same is so for the explanatory accompanying comments in the other letter. I submitted one personally and as president of the society and the society did submit the same resolution as a society resolution.

As is obvious from the resolution there is no detailed recommendation for the exact structure, legal constitution or by-laws or even name for the new organization that is proposed. The resolution and my letters are primarily urgings for the Okla-

homa State Medical Society to assign committees to go into this matter, recognize the need for such an organization.

You have suggested to me previously that the legal opinion of the Law Department of the American Medical Association is against the formation of a new organization like the one proposed in the resolution submitted by the Okfuskee County Medical Society. There is also an enclosure of "Statement of Anti-Trust Immunity of Labor Organizations." There are also remarks concerning the use of the labor or guild vehicle to avert anti-trust laws and various excerpts from legal opinions and rulings in various law suits that these various law suits were not (representative of) labor disputes within the Norris-LaGuardia Act with exemption from the Anti-Trust Laws and/or that these law suits were not representative of labor disputes and could not be enjoined and/or that certain parties in these law suits "(did) not constitute a bona fide union so as to be exempt from anti-trust laws."

The resolution does not propose that a union or a guild or other organization be formed in the strict mold of various existent labor unions. The resolution proposes that an organization be formed to strongly represent M.D.'s and from a position of strength on matters of mutual interest for M.D.'s. The resolution does not mention anti-trust laws, or the Norris-LaGuardia Act. The third paragraph of the enclosure that you sent to me concerning a statement on anti-trust immunity of labor organizations does in itself however point out that the organization such as the resolution proposes *can* be formed and *can function* legally and outside the restriction of the anti-trust laws (since that qualification appears to be pertinent). (I am not a lawyer).

This same paragraph states "anything which any other organization can lawfully do in behalf of self-employed physicians can also be done lawfully by a medical society" this is not denied but it is also true that the American Medical Association and its present structure and with its variety of functions has not been able to function adequately enough or with enough force to prevent for example the enactment of the Medicare Law or to ensure enforcement of the full provisions and intent of the Medicare Law as it is written. The organization that is proposed in the resolution *could* and *would* operate forcefully and from a provision of strength.

Paragraph two of the "statement on anti-trust immunity of labor organizations" suggests that physicians who work on a salaried basis rather than in private practice on a fee-for-service basis can lawfully be represented by either a medical society representing the employed physicians or by a separate organization which represents the employed physician. I do not know if I sent you a copy or not but I did write a letter to Dr. Ed Calhoon, the President of the OSMA in which I project my idea that the organization that is proposed is intended primarily to represent physicians who are engaged in private practice and who are on a fee-for-service basis and who do operate under a system that tends to preserve the physician-patient relationship. In my letter to Dr. Calhoon I specifically suggested that employed physicians (those employed by hospitals, by State, Federal, and Local Health Departments on a full time basis and or by the United States Armed Forces on a full time basis) be excluded from executive committees and or executive positions. Such M.D.'s however could be *members* and *beneficiaries* of the actions of the organization. A copy of my letter to Dr. Calhoon is enclosed.

If various groups and organizations around the country can disrupt Universities, take over the buildings of our Universities, occupy the offices of various University Presidents, and vandalize and destroy various buildings on these campuses, if they can hold mass demonstrations in various cities and in various parks and on various campuses and all with relative impunity then I think that the Medical Doctors of this country have the right to be represented actively and collectively as an organized legal entity.

Concerning the remarks and attitudes of the Legal Department of the American Medical Association I wish to point out that a reasonable individual with common prudence and a reasonable amount of self-interest and desire for self-preservation will, if possible, find legal aid that will actively and forcefully protect his interests regardless of the justness or legality of his cause and/or regardless of his guilt or innocence. Criminal lawyers are not hired by their clients for the purpose of pleading "guilty" for their clients and then agreeing with the prosecuting attorney and the judge that the accused is indeed guilty and should be subject to a large fine, a long prison sentence and finally execution at the end of that sentence. Corporation lawyers and tax lawyers are not hired by their clients for the purpose of ensuring that their clients will pay all of the taxes that the Government would like for them to pay and/or be hindered and hampered by various restrictive and or punitive regulations, statutes, and/or ordinances, and/or law. In the Military Services, Commanding Officers are not disposed to looking kindly upon First Sergeants and Adjutants who know only the Regulations that say that the C.O. can *not* do something that he would like to do and it is a well known fact that although a good First Sergeant or Adjutant may know these regulations he also knows where to find the regulations that say that the C.O. *can* do the things that he wants and needs to do in order to function properly and efficiently and get the job done.

Concerning the Standard Format of Resolutions that you enclosed I agree that this would enhance the consideration of the subject resolution but I do believe that the resolutions are coherent, concise, and clear as to their meaning and they are *currently* available for consideration. I do not think that they should be delayed to be re-written. I think the proper committees should consider them and come up with a workable plan to embody the basic ideas presented in the subject resolutions and to present this detailed plan as a resolution in the standard and proper format. It is requested that you attach this letter to the resolutions as an addendum.

Respectfully,
Charles A. Cashman, M.D.
President Okfuskee County
Medical Society

CAC/jt

Resolution No. 6
(DISAPPROVED)

SUBMITTED BY: Okfuskee County Medical Society

TITLE: Formation of a Union or Guild

REFERRED TO: Reference Committee No. I

I do believe that it is imperative that the Medical Profession does form an aggressive Union or Guild with some muscle in its effort to defend, protect, and preserve itself and its members.

We are all well aware of the fact that despite our relatively long training and relatively long medical education that we did not learn everything that we should have while we were in school. We didn't have time to absorb all that was attempted to be taught to us, we learned much of it by review and experience and regrettably by trial and error and by additional courses and training *after* we graduated from medical school. There is none of us yet that knows all that he would like to know about the practice of medicine.

There is none of us that would not like to be able to continually up-grade his own skill and knowledge. There are those, however, in positions of power and influence in the government and unfortunately even members of prominence among our own profession who demand that pre-medical and medical courses be shortened and even that individuals be taken who have only high school educations and be trained into "doctors associates."

At this very same time, when they are thus calling for a reduction in the quantity and quality of training per new medical personnel they are increasingly demanding that *we* improve the quality of *our* professional medical practice and skill. They are wanting to license less-trained, less-skilled, less-generally-qualified individuals, with less background at the same time they are demanding that we establish members of the profession who have constantly upgraded our skills none-the-less be subject to repeated re-examination as a prerequisite to relicensure.

By harassment and intimidation they prevent the production and manufacture and/or use of certain valuable drugs which we have all used safely and judiciously for the saving and maintenance of the health or preservation of life of many individuals. They prevent the manufacture of various combinations of drugs all of which we have used safely, judiciously, and without mishap and to the marked advantage and well-being of our patients.

Much of this harm has been wrought by non-clinical practitioners who are not even really practitioners; they neither practice clinical medicine and deal with patients nor do they have the talent and skill and initiative to do original, initiative, investigative, and productive research. They are qualified to do only cook-book type of "research" and their methodology is very much in question there.

With our present malpractice insurance rates and the risks that we run each day in examining and treating patients is there any one of us who wants to further compound his liability by being responsible or being forced to be responsible for some substandard individual or aid who is licensed to diagnosis and treat.

We are all aware of the status of medicine in Russia and its socialistic state and in England in its socialized state and in Canada and in its socialized state. We are cognizant of the extremely punitive measures that have been passed as law against Canadian physicians to *force* them to practice medicine and assume the responsibilities and risks of practice.

Constant controls are applied to *our* fees. There has been no individual restraint on the part of either business or labor to control prices and wages, there has been no effort on the part of the government to control these inflationary trends.

The only anti-inflation device put into effect by the government has been the increasing of interest rates which is in itself an inflationary measure because business and professional men have *had* to borrow in order to modernize and replace equipment for their businesses or profession and remain competitive. The raising of interest rates has not prevented borrowing, it has only forced the borrower to pay a higher and inflated and inflationary interest rate in order to buy things at already inflated prices in order that he can survive. The general increase in taxes as a "anti-inflationary measure" is also itself inflationary. If an individual strives and increases his productivity and his income in order to have enough income to still get only the same amount of goods and services at much higher prices he is further taxed out of his increased income before he even gets to spend it or procure his various necessities at their inflated prices.

I think that we need only to look around at the general state of the nation and the general trend of things and to look at the state of affairs of the world in general and to remember history to know that we cannot afford to further delay taking these steps that will assure us protection.

Resolution No. 12.
(APPROVED)

SUBMITTED BY: Oklahoma County Medical Society

TITLE: Financial Aid to Medical Students

REFERRED TO: Reference Committee No. I

WHEREAS, there are many medical students who do not have adequate financial support and

WHEREAS, this problem has been reviewed and discussed with the Associate Dean of Student Affairs at the University of Oklahoma Medical Center and

WHEREAS, there are very limited and few unencumbered and unrestricted funds available to help medical students who are in dire need,

BE IT THEREFORE RESOLVED that the State Medical Association sponsor a yearly, voluntary contribution of $10.00 from each of its members.

BE IT FURTHER RESOLVED that the receipts of same be directed to the Financial Aid to Education Committee of the State Association.

BE IT FURTHER RESOLVED that this Committee present these funds unencumbered and unrestricted to the Associate Dean of Student Affairs to be used for the benefit of those students in need.

Report of the
COMMITTEE ON PLANNING
(APPROVED)
Committee Members

Hillard E. Denyer, M.D., Chairman
Ed L. Calhoon, M.D.
Lucien M. Pascucci, M.D.
Roger Reid, M.D.
C. Riley Strong, M.D.
Jack D. Fetzer, M.D.
Robert J. Hogue, Jr., M.D.
Rex E. Kenyon, M.D.
Hayden H. Donahue, M.D.
B. C. Chatham, M.D.
Orange M. Welborn, M.D.

SECTION I
OKLAHOMA FOUNDATION FOR COMMUNITY MEDICAL CARE

At the 1970 annual meeting of the OSMA House of Delegates, the Board of Trustees was authorized to change the nature of the association's existing loan and scholarship program to provide for a "forgiveness feature" on loans awarded to medical students who would sign contracts to serve required periods of time in medically-needy areas. Further, the Board of Trustees was instructed to act in this regard on the recommendations of the association's Financial Aid to Education Committee.

In order to formulate recommendations to the Board of Trustees, a joint meeting of the Financial Aid to Education Committee and the Committee on Planning was held on July 23rd.

While OSMA deliberations were underway regarding a change in the concept of the loan program, the Oklahoma Legislature established the concept of the loan program, the Oklahoma Legislature established the "Oklahoma Rural Medical Education Loan and Scholarship Fund" along the same lines envisioned by the association, and the Governor turned over control of the state program to physicians serving on the OSMA Rural Medical Council.

This turn of events was considered at the joint meeting on July 23rd and there was concern that the new OSMA program should work in a cooperative relationship with the new state government program, particularly with respect to having basically the same rules and loan conditions, and there should be coordination in the screening and selection of loan candidates. Moreover, it was felt that the provisions of the new OSMA foundation should be related to the existing OSMA Loan and Scholarship Fund, Inc.

Finally, it was decided to make the following recommendations to the association's Board of Trustees:

1. That the association form the "Oklahoma Foundation for Community Medical Care," a non-profit corporation whose purpose would be basically the same as the state government program, and which would be governed by a board of directors comprised of both physicians and laymen. It was further recommended that provision should be made in the articles of incorporation to provide for coordination between the new foundation and the state government program.

2. That the existing OSMA Loan and Scholarship Fund remain operational, but to amend it so that funds could be transferred to the new foundation (the existing program receives about $9,500 a year from OSMA dues).

Under the direction of the two committees, OSMA staff and legal counsel prepared the necessary articles of incorporation and bylaws to create the new foundation, and amendments were also prepared to provide for the transfer of funds from the existing loan fund to the new foundation. These documents were subsequently presented to the Board of Trustees . . . more information as to the progress of this activity may be found in the Board of Trustees Report and in the Report of the Financial Aid to Education Committee.

Meanwhile, because it was known that considerable time would be required to carry out the necessary legal work to form the new foundation and to make it operational, and because of the need to get practitioners into medically-deprived areas at the earliest possible time, the two committees obtained permission of the Board of Trustees to loan $5,000 on a contractural basis to a fourth-year medical student using State of Oklahoma promissory note forms.

SECTION II
BUILDING RENOVATION

The 1970 House of Delegates authorized the Board of Trustees and the Committee on Planning to use available funds for renovating the older portions of the OSMA headquarters building.

It was determined that there was a particular need to purchase new furniture for the three executive offices which were equipped with furniture 15 to 25 years old. Bids were let and it was determined that it would cost $3,006 for three desks and three credenzas of medium quality. However, the OSMA staff learned of a local furniture manufacturer going out of production on a high quality line of office equipment, and it was possible to purchase the necessary furnishings at the manufacturing cost of $1,390.

In addition, the committee has instructed the staff to obtain bids for resurfacing the headquarters building parking lot and driveway.

SECTION III
POSTGRADUATE LEAVE FOR RURAL PHYSICIANS

One project undertaken by the committee appeared to have merit but was abandoned for lack of interest among rural physicians.

The committee contacted fifty rural physicians and offered to arrange for a relief physician to permit the rural doctor to attend an intensive postgraduate refresher course of his choice. It was contemplated that travel trailer housing facilities would be provided for the visiting physician.

However, only a few of the rural physicians contacted expressed interest in the project, and when an attempt was made to work with these on a pilot basis there was no response.

SECTION IV
PEER REVIEW

The committee took note that some form of expanded peer review will be approved by Congress for implementation by January 1, 1972.

It was decided to undertake a study of the avenues of implementation which would be open to the OSMA should the association decide to assume management responsibility for the state of Oklahoma.

As a preliminary step, the chairman of the committee attended the AMA Clinical Meeting in Boston for the express purpose of visiting with other state association delegations to obtain their views and to acquire any documents they might have on foundations for peer review. Much valuable information on the subject was gained by visiting with physicians from other areas.

On January 10th, the committee organized a meeting with representatives of the OSMA Medical Insurance Review Committee and major metropolitan county medical societies. The purpose of the meeting was to investigate the possibility of creating a foundation for peer review under OSMA auspices in order to take control of any federal program which would impose a massive form of peer review on physicians who participate in goverment health care plans.

In preparation for the meeting, foundation plans developed by other medical societies were reviewed and summarized, and special guests were invited from the Medical Association of Georgia which has made considerable progress in preparing for an expanded peer review function.

Much time was spent at the meeting studying the provisions of the so-called Bennett Amendment, the peer review plan which is most likely to emerge as law. This bill will offer medical societies representing 300 or more physicians the opportunity to set up foundations to screen all physicians' health care claims against the government . . . judging them as to the cost of service, over and/or under utilization, quality of service, and the propriety of the choice of health care facility. Under the provisions of the Bennett Amendment, if medical societies decline responsibility for implementation, the program will be turned over to other private or governmental agencies.

Doctor William Dowda of the Medical Association of Georgia reviewed the plans his association has for creating a foundation for peer review, and he spoke in favor of organized medicine assuming the responsibility rather than to turn it over to others.

In the end, the group assembled on January 10th decided to take the problem to the OSMA Board of Trustees for action. As contained in the Report of the Board of Trustees, a special committee was appointed to continue study on the prospect of establishing a peer review foundation. This special committee will report separately to the House of Delegates.

SECTION V

For the past two meetings of the American Medical Association House of Delegates, the Committee on Planning has drafted resolutions for the consideration of the AMA's policy-making body. At the 1970 Clinical Session of the AMA, five resolutions were submitted by the committee. The subject matter included (1) a request that the AMA publish a buyer's guide for adequate health insurance benefits; (2) a request that the AMA unequivocally oppose the Bennett Amendment; (3) a request for an extensive AMA public information program; (4) a request that the AMA drop its endorsement of PRO (peer review organization); and (5) a request that the AMA endorse a flexible approach to peer review which would recognize the peculiarities of the various state jurisdictions.

Report of the
FINANCIAL AID TO
EDUCATION COMMITTEE
(APPROVED)

Committee Members
Hillard E. Denyer, M.D., Bartlesville
Lucien M. Pascucci, M.D., Tulsa
Scott Hendren, M.D., Oklahoma City
Maxwell A. Johnson, M.D., Tulsa
Ed L. Calhoon, M.D., Beaver

Since 1962, the association has paid $5.00 for each dues paying member into the OSMA Loan and Scholarship Fund managed by the O.U. Medical School. Through 1969, $73,000 was transferred to the account, $24,750 of which was awarded to 45 students on the basis of academic achievement and about $48,000, of which was loaned on the basis of need.

In 1970, on recommendation of the Committee on Planning and Board of Trustees, the transfer of funds was frozen and the House of Delegates authorized the creation of a new foundation designed to encourage the location of physicians in rural areas or in city areas of low physician population and high density.

Formation of the new Oklahoma Foundation for Community Medical Care is nearly completed. It will be funded from OSMA dues ($9,600 a year), from the repayment of loans under the existing program ($48,000 in accounts receivable), and hopefully from contributions or bequests from outside sources.

The purpose of the new foundation is to grant non-refundable loans to O.U. medical students who will sign contracts to serve a minimum of two years in medically-needy areas. If a student defaults on the contract, the principal of the loan must be paid plus 10 percent per annum interest.

The new foundation will be governed by a Board of Directors comprised of five members of the association and five laymen. By action of the Board of Trustees, it was decided to use the same physicians who control the OSMA Loan and Scholarship Fund to serve as the five OSMA representatives on the board of the new foundation. These physicians are the OSMA president, president-elect, and the three immediate past presidents. In their capacity as the board of the existing loan and scholarship fund, they will have authority to transfer monies from the existing fund to the new foundation as justified.

The operation of the new foundation is adequately explained in these paragraphs from the bylaws:

"Authority for management and approval of loans or grants-in-aid provided through this corporation shall be totally vested in the Board of Directors. Loans or grants-in-aid may be made only to students of the University of Oklahoma School of Medicine, and no more than $5,000 may be awarded to an individual student in one year."

"The Office of Financial Aid at the University of Oklahoma School of Medicine may be selected as the administrative agent to furnish medical students with loan or grant-in-aid application forms as approved by the Board of Directors, and to execute and carry out the provisions of promissory notes on a form approved by the Board of Directors. The Office of Financial Aid may be selected as the depository of funds received from the Foundation, and if so selected shall render an annual accounting of all receipts and disbursement to the Board of Directors."

"The Board of Directors shall have the ultimate authority in selecting the individual students who shall receive the loans or grants-in-aid. It shall be the ultimate authority in determining the amount of the loans or grants-in-aid within the maximum amount provided hereinabove. It shall have the ultimate authority in determining where, within the State of Oklahoma, the medical service is to be furnished, and it shall be the ultimate authority as to the period of time for such medical service, which period of time shall, in no event, be less than two (2) years."

"The promissory note form to be executed by selected applicants shall contain a repayment forgiveness feature on loans made to applicants who, upon completion of training, satisfactorily complete a minimum of two (2) years of medical service in a needy area as determined by the Board of Directors, based on the advice of the Rural Medical Council of the Oklahoma State Medical

Association. Failure to fulfill the two-year obligation at the completion of training shall, at the sole discretion of the Board of Directors, require full repayment of the principal sum with interest thereon at the rate of ten (10%) percent per annum, said interest to accrue from the date of the promissory note. No interest shall accrue, however, nor shall the note be defaulted during a period of involuntary military service. At the discretion of the holder, the note shall become due and payable with interest from the date of the note, at any such time the maker discontinues the pursuit of medical education for any reason. Evidence of a life insurance policy with an assignment to the Foundation in an amount at least equal to the amount of the indebtedness shall be required as a condition of a loan or grant-in-aid."

"The Board of Directors will be expected to confer with the obligated practitioner in order to determine the medically-needy communities having the highest possible degree of compatibility with the obligated practitioner, in order to encourage the continuing rendering of service after the obligated period. The Board of Directors shall periodically confer with the obligated practitioner during the mandatory practice period and render such assistance to him as may be practical, but such assistance shall not alter, modify or compromise the practitioner's obligations, all as set forth in his written obligation."

Recommendations:

1. It is recommended that the House of Delegates approve the Oklahoma Foundation for Community Medical Care.

Report of the SECRETARY TREASURER *(APPROVED)*

Financial Statement

Since the association's fiscal year ends on May 31st, a complete audit of accounts cannot be presented at the time of the annual meeting. However, to provide Delegates with an indication of the OSMA's financial status, following are reports on the first ten months' operations in our two basic operational accounts, the Membership Account and the Journal Account.

Membership Account

Income:	
Membership Dues	$137,103
AMA Commissions	1,245
Interest	4,478
Scholarship and Loan Fund (from dues)	7,879
Building Lease	3,500
Postgraduate Courses	42
OSMA Newsletter	1,108
Total Income	$155,355
Expense:	
Fixed Expenses	$100,703
Depreciation	3,333
Councils and Committees	
Public Policy	2,180
Insurance	-
Prof. Education	2,341
Socio-Economic	-
Public Health	1,057
Prof & Intervocation Relations	-
	5,578
Scholarship and Loan Fund	7,879
In-State-Travel	6,807*
Out-State-Travel	13,042
Okla. Health Careers Council	3,000
Mortgage Payments—Building	4,570
OSMA Newsletter	2,997
Total Expense	$147,909
Surplus	7,446

*Includes expenses carried over from last fiscal year.

JOURNAL ACCOUNT

Income:	
Journal Ads, Sales, Subscriptions	$24,626
Subscriptions from Dues	4,580
Directory—Ads and Sales	556
Total Income	$29,762
Expense:	
Journal Expense	$33,346
Directory Expense	275
Total Expense	$33,621
Deficit	$3,859

When the surplus of $7,446 in the Membership Account is related to the deficit of $3,859 in the Journal Account, a net surplus for the first ten months of only $3,587 results. This does not compare favorably to our budgeted surplus figure of $15,716.

However, income and expense comparisons during the last two months should make the financial picture somewhat brighter. Income should rise by $32,925 (principally because of outstanding dues of $30,897) whereas expenses are expected to increase by only $25,750. Thus, when the net gain for the last two months of $7,175 is added to the ten-month surplus of $3,587, there is a resultant year-end surplus anticipated in the amount of $10,762. The actual surplus may be even closer to our budgeted surplus since conservative estimates of dues income have been used in this study.

Journal advertising has continued to decline during the past year due to cutbacks in advertising expenditures by national drug manufacturers, but the outlook for the future should show a 15 percent increase in national accounts.

The annual meeting has not been included in the above figures. While it is traditionally-designed as a break-even project, the Annual Meeting Committee, too, is experiencing declining interest from national drug manufacturers who are apparently phasing out their exhibits at state medical conventions. See the Report of the Annual Meeting Committee.

As directed by the House of Delegates at the 1970 annual meeting, one-half of last year's surplus ($5,567.54) was added to the association reserves ($27,841.69) bringing total reserves to a current figure of $33,409.23. These funds are carried in a Certificate of Deposit at interest.

1971-72 BUDGET

A budget is only a guide to the financial operations of any organization, but it is a useful tool in apportioning income to various expense categories. The following budget is tentatively submitted, it may need to be revised by the Board of Trustees based on the actions taken during this annual meeting:

Income:	
Membership Dues	$180,000
Scholarship and Loan Fund (from dues)	9,500
Journal Ads, Subscriptions	32,000
Annual Meeting	21,000
Interest	5,000
AMA Commissions	2,100
OSMA Newsletter Ads	2,250
Building Lease Income	4,200
Total Income	$256,050
Expense:	
Fixed Expenses	$130,000
Depreciation	4,000
Student AMA	4,000
Councils and Committees	
Public Policy	3,000
Insurance	500
Prof. Education	3,000
Socio-Economic Activities	2,000
Public Health	2,000

Prof. & Intervocation Relations	500
	11,000
OSMA Newsletter	3,500
Loan Fund	9,500
In-State-Travel	4,500
Out-of-State-Travel	14,500
Journal	33,000
Annual Meeting	21,000
Oklahoma Council for Health Careers	3,600
Mortgage Payments	5,484
Total Expense	$244,034
Surplus	$11,966

Recommendations:

1. It is recommended that the proposed budget be approved pending any revisions made necessary by actions at this annual meeting.

2. Regarding an anticipated surplus for the current fiscal year, it is recommended that the House of Delegates authorize the Board of Trustees to dedicate up to $10,000 toward retiring the loan made necessary by the building expansion program.

Report of the BOARD OF TRUSTEES *(APPROVED)*

Three meetings of the Board of Trustees have been held since the last annual meeting. This report covers the significant actions of these meetings. Actions taken at the April 29th meeting will be covered in the accompanying Supplemental Report.

Reportable actions taken at meetings held October 18th, December 11th and March 14th are summarized below:

1. The Board approved an annual audit of the association's accounts for the fiscal year ending May 31, 1970 which revealed an operating surplus of $11,135.08. Copies of the auditor's report were mailed to all members of the House of Delegates. A revised budget for the 1970-71 fiscal year, showing an estimated surplus of $15,716, was also approved.

2. At the request of a Trustee, the Board reconsidered its April 28, 1970 decision to participate in hearings where a physician's Medicaid billing privileges were being challenged by the Department of Public Welfare on the grounds of abuse of the program. Under guidelines negotiated between DPW and OSMA representatives, it was provided that the association's Medical Insurance Review Committee would participate in such hearings by reviewing specific charges brought against a member physician and by formulating recommendations to the Department of Public Welfare, such recommendations to involve probation, suspension or revocation of billing privileges, or complete dissent with the charges brought by the department. The question of reconsideration revolved around whether or not the recommendations of the OSMA committee would be honored by DPW, and it was decided to write a letter to the Director of the Department of Public Welfare reinforcing item VI of the guidelines, to wit: "*Mutual Trust:* While it is recognized that an agency of government cannot delegate final responsibility to a non-governmental organization, the concept of peer review cannot function effectively unless its opinions and recommendations are highly regarded by the responsible governmental agency."

To date, the Department of Public Welfare has not brought any charges against an association member calling for the denial of Medicaid billing privileges.

3. The so-called Bennett Amendment to the Social Security Act was considered by the Board on two occasions. This amendment, if it becomes law, will invite medical societies representing 300 or more physicians to establish foundations for the purpose of reviewing all Medicare, Medicaid and AFDC physicians claims for cost, utilization, quality and appropriateness of health care facility used. If medical societies refuse to provide "Professional Standards Review Organizations" as required by the amendment, then the government will look to other private or local governmental organizations to carry out the provisions of the law.

Because legislative analysts expect some form of the Bennett Amendment to become law in 1971, the Board appointed a Foundation for Peer Review Study Committee to evaluate OSMA involvement in the peer review function and to present a preliminary report to the House of Delegates at this annual meeting.

4. The Board has kept informed on various bills now pending before Congress to nationalize health insurance for all Americans, and it expects additional bills to be introduced during coming months. While the Board is generally opposed to the concept of national health insurance, certain aspects of the AMA Medicredit Bill have been approved as a more desirable alternative to other concepts, particularly since it appears that some form of tax-paid universal health plan will become law in 1972 or 1973.

5. Two programs to create physicians assistants training schools at the University of Oklahoma School of Medicine were evaluated by the Board of Trustees. After hearing a presentation from the project director, the Board endorsed the principle of these programs as means of alleviating the health manpower shortage. However, pursuant to the directive of the House of Delegates last May, the OSMA President has appointed a Committee on Health Related Professions to maintain continuing liaison with the medical center to keep the programs in proper perspective.

6. At the 1970 meeting of the House of Delegates, it was recommended and approved that the character of the Oklahoma Medical Association Loan and Scholarship Fund, Inc. be changed to provide non-refundable loans to medical students who would sign contracts to serve a minimum of two years in a medically-needy area. The Board of Trustees has approved the articles of incorporation and the bylaws of the "Oklahoma Foundation for Community Medical Care" to accomplish this purpose. Moreover, in order to permit the transfer of dues funds to the new foundation, the articles of incorporation of the OSMA Loan and Scholarship Fund were amended. The new foundation will be governed by a board of directors comprised of the OSMA's Financial Aid to Education Committee (five physicians) and five laymen. Up to $5,000 a year may be loaned to medical students who will promise to fulfill obligations to serve minimum periods of time in rural or inner city areas; failure to meet the contractural obligation will require that loans be repaid to the foundation at 10 percent per annum interest.

7. As an adjunct to the Oklahoma Foundation for Community Medical Care, and on recommendation of the OSMA Rural Medical Council, the Board approved an appropriation of approximately $1,000 to underwrite the OSMA share for a pilot survey of a rural region in Oklahoma to plan for the optimum development

of health services in the area. The attitudes of physicians, location of facilities, transportation arteries, use of allied health personnel and other factors will be studied in order to establish a definite developmental plan for the area. Not only will this program assist the Oklahoma Foundation for Community Medical Care in identifying priority communities for obligated loan beneficiaries, but the survey technique for the pilot area can well be applied to other medically-needy areas of the state.

8. Taking note that the OSMA annual meeting is suffering financial difficulties and may not be meeting the needs of the membership as to program content and organization, the Board of Trustees has asked the association's Committee on Planning to carry out a study by July 1st to include optimum meeting dates, reorganization to permit the House of Delegates to attend more of the scientific program, etc. This year's Annual Meeting Committee was authorized to continue the $5 registration fee, to increase honorariums for guest speakers, and to book a well-known socio-economic speaker to perhaps enhance attendance.

9. As recommended by the Committee on Alcoholism and Drug Abuse, the Board of Trustees went on record as favoring a reduction of the first offense penalty for possession of stimulants, depressants and hallucinogens to the misdemeanor level, and to favor stiffer penalties for drug pushers.

10. The Board approved association sponsorship of an Orient Tour in joint cooperation with Kansas physicians. Departing from Oklahoma City on October 17th, 1971, the tour will involve a one-week stay in Tokyo and one-week in Hong Kong at a cost of $898.00 per person. For an additional fee of $30.00 there will be postgraduate courses presented by oriental physicians in both cities.

11. Marcella Steele, M.D., Joe M. Parker, M.D., and Mrs. Port Johnson of the Woman's Auxiliary were appointed by the Board as the OSMA representatives on Board of Directors of the Oklahoma Council for Health Careers.

12. Following up on an OSMA request that Blue Shield restore the composition of its board to nine physicians and nine laymen (instead of nine physicians, three dentists and twelve laymen), the Board heard a report from the President of Oklahoma Blue Shield indicating that progress is being made by the Oklahoma State Dental Association to form a separate Blue Shield Dental Service Corporation. According to the President of Blue Shield, once this is accomplished a separate board for the dental program will be established and physicians will once again have fifty percent of the membership of the board dealing with Blue Shield medical service.

13. Representatives of the Aetna Medicare Claims Administration were invited to appear before the Board to explain the use of a common charge screen by both Aetna and the Department of Public Welfare in the payment of Medicare claims. It was explained that for some time the OSMA had objected to a double standard in the application of UCR payments for physicians services under governmental health care programs. For several years, this was impossible due to federal regulations, but in 1970 the federal Bureau of Health Insurance decreed that only one UCR payment system could be used in a state, and in Oklahoma it was required that effective January 1st, 1971 the Department of Public Welfare would have to change its charge screens and system to conform to Aetna's.

14. The Board made provision in the expanded headquarters building for office space for the Woman's Auxiliary to the OSMA. Subsequently, the Board approved an appropriation of $200 to assist the auxiliary in decorating and furnishing the space (the auxiliary had previously contributed $2,000 toward the building expansion project).

15. In 1969, the Board of Trustees voted to streamline and expedite the association's Medical Insurance Review (peer review) procedures by providing that the state association review committee would resolve problem cases on a monthly basis, rather than the former system whereby cases were sent to county society committees for initial review and the state group served basically in an appellate capacity. However, under the amended program, the opinions of county medical society review committees were to be invited prior to any review at the state level thus attempting to avoid disenfranchising a county medical society which wanted to participate in the review process. Subsequently, in 1971, the Board received a resolution from the Tulsa County Medical Society requesting that the Tulsa committee be granted primary jurisdiction. After due consideration, the Board tabled the Tulsa County resolution on the grounds that to grant Tulsa special dispensation would require, in fairness to other counties, that the OSMA revert back to a review system which did not work well on a state-wide basis. Morover, due to pressures for national peer review legislation (item 3 of this report), it was felt that adjustments in the present OSMA peer review program at this time would not be practical in the light of impending changes of severe magnitude to be wrought by the federal government.

16. On petition of the Tillman County Medical Society and the Comanche-Cotton County Medical Society both societies wish to dissolve in favor of amalgamating into the Comanche - Cotton - Tillman Counties Medical Society. In accordance with the OSMA bylaws, the Board of Trustees approved both the dissolution and amalgamation of these societies on March 14th and herewith recommends that the House of Delegates, by the adoption of this report, establish the Comanche-Cotton-Tillman Counties Medical Society subject to the receipt of an appropriately amended Constitution and Bylaws for the new constituent society.

17. The Board appointed C. Riley Strong, M.D., Arnold G. Nelson, M.D. and William M. Leebron, M.D. as advisors to the OSMA Woman's Auxiliary.

18. Life Membership applications were approved during the year for the following members (others may be included in the supplemental Board of Trustees report):

William A. Dean, M.D, Tulsa
Charles H. Eads, M.D., Tulsa
Joseph Fulcher, M.D., Tulsa
R. M. Wadsworth, M.D., Tulsa
Robert H. Akin, M.D., Oklahoma City
J. Samuel Binkley, M.D., Oklahoma City
Joseph W. Kelso, M.D., Oklahoma City
Ellis Moore, M.D., Oklahoma City

H. C. Morrison, M.D., Oklahoma City
Frances P. Newlin, M.D., Shawnee
A. K. Cox, M.D., Watonga
Fred T. Perry, M.D., Watonga
John P. Grimes, M.D., Wewoka
James M. McMillan, M.D., Vinita
Glenn S. Kreger, M.D., Tonkawa
Perry E. Hewitt, M.D., Muskogee
I. C. Wolfe, M.D., Muskogee
William E. Wendel, Jr., M.D., Eufaula

19. Dues were waived for ten physicians on the basis of financial hardship.

20. The Board of Trustees reports the following breakdown of membership:

Active Members	1,971
Active Dues-Exempt Members	14
Applications Pending	48
Life Members	141
Affiliate Members	8
Junior Members	49
TOTAL	2,231

Recommendation:

1. It is requested that the House of Delegates affirm the action of the Board of Trustees.

Supplemental Report of the BOARD OF TRUSTEES *(APPROVED)*

At the annual meeting of the Board of Trustees, held at 9:00 a.m. on April 29th, the following actions were taken:

I. Doctor C. Riley Strong was re-elected as Chairman of the Board of Trustees and Doctor Orange M. Welborn was re-elected as Vice-Chairman.

II. The Board approved the nominations of the President-Elect, Doctor Pascucci, regarding the Executive Committee. Doctor Pascucci appointed the following physicians to serve on the Executive Committee:

President - Elect, Vice - President, three AMA Delegates, Speaker of the House of Delegates, Chairman of the Board of Trustees, Secretary-Treasurer and Past-President.

III. The Board of Trustees appointed the Board of Directors of the Oklahoma Political Action Committee.

IV. To fill a vacancy on the Board of Medical Examiners, in accordance with the state laws, the Board of Trustees appointed three nominees: Frank McGregor, M.D., R. Barton Carl, M.D. and Tom Parker, M.D.

V. The Board reappointed Harris D. Riley, Jr., M.D., as a member of the Editorial Board, Oklahoma State Medical Association Journal.

VI. As an appointment to the State Hospital Planning Advisory Council, the Board nominated three physicians: C. E. Lively, M.D., McAlester; Burdge F. Green, M.D., Stilwell and David Selby, M.D., Enid.

VII. As an appointment to the Health Facilities Advisory Council, the Board named the following physicians: Norme Sneed, M.D,. Joe Tyler, M.D. and M. Joe Crosthwait, M.D.

VIII. The Board approved a Life Membership application from the Tulsa County Medical Society on behalf of Harold J. Black, M.D., Tulsa.

IX. An application from the Washington-Nowata County Medical Society for a 50-year membership on behalf of Forrest S. Etter, M.D. was approved.

X. The Board approved five resolutions for late introduction to the House of Delegates, as follows:

No. 10 — Opposition to "Professional Services Review"

No. 11 — Impowering the Board of Trustees to negotiate with AMA to bring about a change in policies, reporting the results of such negotiation and recommendations persuant to mandatory or voluntary AMA membership.

No. 12—Financial Aid to Medical Students

No. 13—Relations with the Department of Public Welfare

No. 14—Blue Shield UCR Program

XI. The Board took special consideration of the Report of the Foundation of Peer Review Study Committee. While the Board does not endorse the concept of the so-called Bennett Amendment, it believes that the alternatives presented in the committee report leave the association with no course but to take action to establish a foundation and assume control of any peer review legislation which may emanate from Congress.

This action by the Board was made reluctantly and under protest, but no suitable alternative seems to be available. Immediate legal implementation to establish a foundation is recommended by the Board of Trustees.

XII. Senate Joint Resolution No. 26, presently being considered by the Oklahoma Legislature, calls for a feasibility study of establishing either a medical school or an osteopathic school in Tulsa. The resolution specifically requests the cooperation of the Oklahoma State Medical Association in carrying out the study. The Board spent considerable time considering this resolution, and approved participation in the study in order to provide the best possible information to the Oklahoma Legislature.

Report of the PRESIDENT *(APPROVED)*

Fellow delegates, guests and professional associates. I stand here this evening with a sense of humility and humbleness as I ponder medicine's position of the future. I am sure most of us here tonight realize that we occupy a rather unique position among men of all professions. We stand not so much on our accomplishments as we do on the shoulders of yesteryear's pioneer physicians. In actuality, our present status is really no accident, due to their foresight, self-sacrifice, and distinguished posture.

I am fearful that the unified, disciplined, competitive approach to medicine is about to end. If this be so, I can say with no reservation that I am most thankful to have practiced in the fee for service, competitive basis system. I would not have missed this opportunity and would be derelect if I did not try to preserve this for those who follow.

As you know for the past 40 years the bureaucrat has felt responsible for all, but the physician has managed to elude; thus avoiding complete usurption; hence our healthy and vigorous circumstance at this time. Socialism in order to control must first fragment and confuse; entice and promise; then renege. Although the democratic process be not perfect, it is the best yet devised. How much division can an organization tolerate, yet continue to function, one can but speculate.

At this time, the Oklahoma State Medical Association definitely is not fragmented. The cooperation and assistance I have experienced this year has been almost unbelievable. The average physician is capable, conservative, kind and industrious. We find ourselves faced with a manpower shortage in certain geographic areas. I see this as medicine's No. 1 challenge and like others, accept

this challenge as *ours* to remedy.

Government would like the populace to believe that any care is superior to none. This simply is definitely not so. There are very few people today who sincerely seek good medical advice but who are greatly rewarded; though inconvenienced by minor time lapses. These time lapses of course, are far less than socialized systems experience.

I would once again repeat, as I have many times before, that Oklahoma's problems are unique to Oklahoma and should be solved by Oklahomans. Your Rural Health Council, in conjunction with the legislature, is working to solve medical impoverishment in Oklahoma. Your Legislative Council has been of invaluable aid in this area. Your Medical School Liaison Committee has made much headway in uniting Town and Gown. In all these ventures we have found certain problem areas which could and should be changed. I personally have felt for sometime that physician inequities might well be changed through altering the medical schools admissions process, not only in Oklahoma but nationwide. I have talked this with many knowledgable men, all of whom feel much the same. Being perhaps a bit less choosy intellectually and more conscious of background, motivation and common purpose at the admissions level might well improve the outlook for *more practicing* doctors here and nationwide. There are as many medical students on Oklahoma's admissions board as there are practicing physicians. Having discussed this with many state physicians, I can truthfully say they are virtually 100% opposed to this practice. The education process, from high school diploma to M.D. degree, could and should be shortened at no detriment to the learning process.

As I mentioned earlier, our profession is unique and we are being scrutinized by both politicians and businessmen. They see here a fertile field to exploit and perhaps honestly feel it can be improved upon through their intervention. The electronics era has created many chances for experimentation and our own profession perhaps offers the neophyte researcher a heyday of such exploration. Though undoubtedly much can be accomplished, change for change sake is not true experimentation.

The public through television's eye sees the AMA as a rueful giant strutting the land, obliterating any competitiveness that rears its head; thus giving us a doctor monoply. This of course is not true. We are professional men ever eager to improve both quantity and quality, but unlike other professions we have thus far been unified enough to insist on a tried and proven course before we embark on a less proven road. Oklahoma has had much success in changing national AMA policy and I might add our voice is much respected at a national level. I would regret any less participation in helping shape national policy.

Tonight, as we contemplate our future, I think it is safe to say that the practice of medicine as we know it may well not exist in the future. Some form of national health insurance is most certainly the order of the day. I believe it behooves us to form closer liaison with our membership to more effectively deal with this. I wish tonight I could say that we'd divorce ourselves from all government programs and go our own way and do our own thing, but I believe this is unwise and perhaps not feasible. We must keep informed in order to *implement* and not merely *enforce* government regulation and I believe it is not just a matter of semantics. The socialists would be most happy to see medicine relinquish its responsibilities, thus paving the way for consumers of health care to take control . . . *this must not happen!* I would therefore caution and counsel this House of Delegates to be determined to work for the continuation of the private practice of medicine, and I believe this can best be done by our own implementation of inevitable government regulation. To abrogate this responsibility is unwise and detrimental to us. I shall continue to advocate unification and to discourage fragmentation. I believe with all my heart that the fee for service medicine is much the best and that we should salvage all we can of this noble goal.

I would recommend to this House tonight the formation of a foundation, under the auspices of the OSMA to deal with peer review and utilization control. Our insurance review committees have worked tirelessly and expansion along these lines seem in our best interests. We have for the most part received somewhat fair treatment in our relationships with major third party carriers. This experience should not be lost.

In closing, I must confess I have rather enjoyed this year. Though my professional relationship with members of OSMA has been of the highest calibre, still my most enjoyable remembrance shall be my association with our administrative staff—Don-Dave and Ed. These men are gentlemen and their sincerity, honesty and integrity have been a source of great help to me. I shall be forever grateful to the Delegates and Trustees for allowing me to serve OSMA this past year. Thank you.

Resolution No. 1.
(DISAPPROVED)

SUBMITTED BY:
Robert H. Johnson, M.D.
Cleve Beller, M.D.
Robert G. Perryman, M.D.
Boyd O. Whitlock, M.D.
Hays R. Yandell, M.D.
Robert T. Cronk, M.D.
Walter E. Brown, M.D.
William G. Mays, M.D.
H. Kenneth Ihrig, M.D.
W. F. Phelps, M.D.
Selwyn A. Willis, M.D.
Daniel R. Storts, M.D.

TITLE: Voluntary AMA Membership
REFERRED TO: Reference Committee No. 1

In accordance with Chapter XIII of the Bylaws of the Oklahoma State Medical Association as adopted May, 1966, and amended through June, 1970, the following Amendments to the Bylaws are proposed:

Chapter I, Section 1.00. It is proposed to strike the final sentence in this Section which reads:

"All members of component societies and of this Association are required to belong to the American Medical Association." This Section would then read: "All membership in the Oklahoma State Medical Association shall originate in component societies. Except as otherwise provided, membership in a component society and in this Association shall be granted only to residents of Oklahoma who are citizens of the United States, and to Doctors of Medicine who shall have received that Degree from an educational institution approved by the Board of

Trustees, and who are licensed by the Oklahoma State Board of Medical Examiners."

Chapter I, Section 3.00. It is proposed to strike the portion of this Section which reads:

"Such applications shall be submitted to the Department of Investigation of the American Medical Association. An authenticated copy of the Report of the Department of Investigation and any information available from the executive office shall, in turn, be forwarded to the component society for the information of its Board of Censors. Accomplishment of this procedure is a prerequisite to membership in the Association."

This Section would then read: "All secretaries of component societies shall submit a copy of all applications for membership to the executive office of the Association before final action on the application is taken."

Chapter II, Section 2.00. It is proposed to strike this Section in its entirety from the Bylaws of the Oklahoma State Medical Association.

This Section reads: "Section 2.00 AMERICAN MEDICAL ASSOCIATION DUES. All active members of the association shall pay annual dues or assessments levied by the American Medical Association as may be required by the classification of membership. AMA dues and assessments shall be collected and remitted by component societies in like manner as state association dues and assessments, and failure to pay AMA dues and assessments shall result in suspension or termination of state association membership in accordance with the same terms applicable to state dues and assessments."

It is respectfully requested that these proposed amendments be submitted to the House of Delegates at the annual meeting of the Oklahoma State Medical Association in Tulsa, April 29th-May 1st, 1971.

Resolution No. 2.
(DISAPPROVED)

SUBMITTED BY: Tulsa County Medical Society

TITLE: Amending the Bylaws of the Oklahoma State Medical Association to Eliminate Compulsory Aspects of American Medical Association Membership.

REFERRED TO: Reference Committee No. I

WHEREAS, Chapter I, Section 1.00 of the Bylaws of the Oklahoma State Medical Association requires all members to belong to the American Medical Association, and

WHEREAS, this requirement makes membership in the AMA compulsory, depriving the individual member freedom of choice, and

WHEREAS, Oklahoma is only one of ten state medical associations with such a requirement for compulsory AMA membership, and

WHEREAS, the members of the Oklahoma State Medical Association are deprived of a freedom of choice enjoyed by a majority of physicians in the United States,

NOW, THEREFORE, BE IT RESOLVED, that the requirement for membership in the American Medical Association be eliminated from the bylaws of the Oklahoma State Medical Association.

Resolution No. 3.
(DISAPPROVED)

SUBMITTED BY: Carter-Love-Marshall Medical Society

TITLE: Voluntary AMA Membership

REFERRED TO: Reference Committee No. I

WHEREAS we, the members of Carter-Love-Marshall Medical Society, feel that compulsory membership in AMA is unnecessary, unfair, and an infringement on our constitutional rights, and

WHEREAS we regard mounting dues in said organization as excessive, and

WHEREAS we regard AMA leadership as less than adequate,

We therefore propose that all bylaws providing for compulsory membership in AMA be rescinded retroactive to and effective on January 1, 1971.

Resolution No. 4.
(DISAPPROVED)

SUBMITTED BY: Lincoln County Medical Society

TITLE: Voluntary AMA Membership

REFERRED TO: Reference Committee No. I

WHEREAS, there are only nine (9) other states in the Union besides Oklahoma requiring American Medical Association membership in order to belong to a State Association, and

WHEREAS, three (3) State Associations have recently dropped the MANDATORY MEMBERSHIP REQUIREMENT, and

WHEREAS, the influence of the AMA appears to be liberal, as well as advocating GROUP PRACTICE more than is necessary, and

WHEREAS, we of the Lincoln County Medical Society have no MANDATORY MEMBERSHIP REQUIREMENT because we feel the decision to be a member or not to be a member should remain with the individual member of the profession.

BE IT RESOLVED, therefore, that we, the members of the Lincoln County Medical Society, urge that the House of Delegates of the Oklahoma State Medical Association vote to abolish MANDATORY MEMBERSHIP REQUIREMENT from this date on.

Resolution No. 11
(APPROVED)

SUBMITTED BY: Oklahoma County Medical Society

TITLE: Impowering the Board of Trustees to negotiate with AMA to bring about a change in policies, reporting the results of such negotiation and recommendations pursuant to mandatory or voluntary AMA membership.

REFERRED TO: Reference Committee I

WHEREAS, Chapter I, Section 1.00 of the By-Laws of the Oklahoma State Medical Association requires all members to belong to the American Medical Association, and

WHEREAS, the American Medical Association has not effectively resisted governmental intervention into the private practice of medicine, and

WHEREAS, the American Medical Association has assisted the government in developing plans for further encroachment on the private practice of medicine, and

WHEREAS, these plans and policies are not in keeping with the policies and beliefs of the Oklahoma State Medical Association, or a majority of its members, and

WHEREAS, the Oklahoma State Medical Association does not feel that its views are being properly represented by the American Medical Association, and

WHEREAS, the American Medical Association has been completely and totally ineffective in resisting the

encroachment into the private practice of medicine,

NOW, THEREFORE, BE IT RESOLVED, that the Board of Trustees be given the authority to negotiate with the officers and Trustees of the American Medical Association to bring about a change in policies of the American Medical Association so that the views of the physicians in the private practive of medicine are known and protected,

NOW, THEREFORE, BE IT FURTHER RESOLVED, that the Board of Trustees shall report back as soon as possible to the House of Delegates regarding the progress of such negotiations with the officers and trustees of the American Medical Association and shall recommend either continuation of the present mandatory provision or a change to voluntary AMA membership together with the appropriate amendments to the By-Laws to accomplish same.

Report of the CONSTITUTION AND BYLAWS COMMITTEE

(APPROVED BY QUALIFICATION)

Committee Members

George H. Garrison, M.D., Oklahoma City, Chairman
E. K. Norfleet, M.D., Tulsa
Clinton Gallaher, M.D., Shawnee
Arnold G. Nelson, M.D., Midwest City
Claude Lively, M.D., McAlester
Paul H. Rempel, M.D., Enid

Your committee, as provided in the bylaws, met to consider a number of proposed changes in the bylaws of the association. Each of the three proposed changes will be covered in detail below and recommendations regarding each will be made at the end of this report.

Your committee received a request from the OSMA Medical School Liaison Committee to formulate the necessary amendments which would change the name of that committee to the Medical *Center* Liaison Committee. It was pointed out that the relationship between the association and the medical center now goes far beyond the original concept of maintaining a simple working relationship with the medical school.

Another proposed amendment to the bylaws was brought by a physician-member of the association, Roger Reid, M.D., of Ardmore. Doctor Reid requested your committee to study the possibility of amending the bylaws to provide for membership for medical doctors who are not citizens of the United States, but who have "declared an intent" to become citizens. Doctor Reid pointed out that the law of Oklahoma has been changed to provide that a person who has declared an intent to become a citizen may be licensed to practice medicine in this state. His amendment would allow the association to take into membership all medical doctors who are licensed to practice in Oklahoma.

The third item brought to your committee's attention was actually four separate items, four resolutions calling for voluntary AMA membership. The present bylaws of your association require that all members of the OSMA must belong to the American Medical Association and pay appropriate dues. Four resolutions were offered that would change this requirement. Each of the resolutions will be discussed separately below.

Resolution No. 1 was offered by a group of Tulsa physicians and called for specific amendments to the OSMA bylaws. These amendments are spelled out in great detail. Your committee feels that this resolution does more than its authors intended to do. As an example, it eliminates the association's right to forward all membership applications to the AMA's Department of Investigation. This department is the only national organization established to investigate M.D.s. Its services are used by county and state medical societies, and by the Medical Licensure Boards of the various states.

Resolution No. 1 would also remove the state association's right to collect AMA dues. The AMA constitution and bylaws requires that their dues be collected by the state associations and forwarded, in lump sum, to the national office. Since the AMA has a mandatory state and county membership requirement, it has no other mechanism for collecting its dues.

Resolution No. 2 was authored by the Tulsa County Medical Society and proposes that the bylaws be amended, without specific wording, to eliminate the AMA membership requirement. (Your committee will make a specific wording recommendation at the end of this report.)

Resolution No. 3, while calling for voluntary AMA membership, proposes that it be retroactive back to and effective on January 1st, of this year. Your committee feels that this particular portion of resolution number 3 is not only impractical, but probably impossible. The committee wishes to point out that as of the time of the annual meeting all AMA members would have received four months of membership benefits.

The Lincoln County Medical Society authored resolution No. 4 calling for voluntary AMA membership. It is similar to resolution No. 2, in that it calls for an amendment to the bylaws without giving specific wording.

After considering all of the above outlined information, your committee wishes to make the following recommendations:

Recommendations:

1. Your committee recommends that the bylaws be amended, in the following manner, to change the name of the Medical *School* Liaison Committee to the Medical *Center* Liaison Committee. Amend Chapter X by deleting the word "school" and replacing it with the word "center" wherever it is used in that chapter in the phrase "Medical *School* Liaison Committee." This word appears in Section 1.00, Section 4.00, and Section 4.01.

2. Your committee could not reach accord regarding the changing of the bylaws to provide for membership for non-citizens who filed a declaration of intent to become citizens. However, in the event the House of Delegates decides that such a change is in order the committee wishes to recommend the following wording: Amend Chapter I, Section 1.00, by inserting the words ". . . or who have filed a declaration of intent to become citizens." between the words "citizens" and "of the United States," in the second sentence of that section. The entire sentence would then read, "Except as otherwise provided, membership in a component society and in this association shall be granted only to residents of Oklahoma who are citizens *or who have filed a declaration of intent to become citizens* of the United States, and to doctors of medicine who shall have received that degree from an educational institution approved by the Board of Trustees, and who are licensed by the Oklahoma State Board of Medical Examiners."

The first and last sentences of that section would not be changed by *this* amendment.

3. Your committee could not reach accord on a recommendation regarding AMA membership. However, in the event the House of Delegates sees fit to amend the bylaws to make AMA membership voluntary, your committee suggests the following changes: Amend Chapter I, Section 1.00, of the bylaws by deleting the entire last sentence of that section. All of the wording, with the exception of the section number and the title of Chapter II, Section 2.00, should be deleted, and the following wording inserted in its place . . . "Members of this association who elect to become members of the American Medical Association shall pay AMA dues and assessments as levied for their appropriate classification of membership. AMA dues and assessments shall be collected and remitted by component societies in like manner as state association dues and assessments." Chapter V, Section 7.036 should be amended by inserting the words ". . . involving AMA members . . ." to make the first sentence of that section read, "Judicial decisions of the Board of Trustees *involving AMA members* may be appealed to the Judicial Council of the American Medical Association in accordance with that organization's constitution and bylaws."

4. In the event that the House of Delegates chooses to make AMA membership voluntary and / or change the bylaws to provide for membership for non-citizens, your committee recommends that all county societies by instructed by the House of Delegates to amend their bylaws accordingly.

Report of the ANNUAL MEETING COMMITTEE *(APPROVED)*

Committee Members

Floyd Miller, M.D., Tulsa, Chairman
Wm. L. Parry, M.D., Okla. City
Paul D. Erwin, M.D., Oklahoma City
Jack Fetzer, M.D., Woodward
David O. Merifield, M.D., Tulsa
Dale E. Groom, M.D., Oklahoma City
Stephen J. Adelson, M.D., Tulsa
Mrs. Donald W. Bobek, Tulsa
John A. Blaschke, M.D., Oklahoma City
Arthur F. Elliott, M.D., Oklahoma City
Paul Vann, M.D., Lawton
Jesse Chandler, M.D., Muskogee
Jake Jones, M.D., Shawnee
William McDoniel, M.D., Chickasha
E. C. Yeary, M.D., Ponca City

The traditional methods for producing a statewide meeting for Oklahoma doctors apparently will produce neither the income nor the attendance for a successful convention. The 64th (1970) Annual Meeting had the most elaborate scientific program in recent years and also the lowest attendance. The birth of organized specialties has created an abundance of scientific programs directed to narrow areas that appeal to the specialized physician more than the general scientific programs associated with a state meeting. In addition, electronic apparatus available to all provide a constant barrage of tapes, Journals, telephone consultations and eyewitness accounts on virtually any subject, at any time, by the world's foremost medical experts. Modern transportation gives us easy access to Hong Kong, Australia, London, Las Vegas and Chicago, etc. for scientific sessions on important topics at reasonable prices.

It is no wonder then that drug companies and purveyors of medical goods and services who specialize in specific areas tend to exhibit at specialty meetings where they find more receptive audiences. Speakers too, are more inclined to accept those invitations that give them an opportunity to speak to larger, more specialized groups.

Thus, State Medical Meetings are facing a serious decline in both attendance and income.

The Annual Meeting Committee responsible for this — the 65th meeting of Oklahoma Doctors has considered these problems and has attempted to design a program that hopefully will have wide appeal to all. We have planned on the premise that this is a meeting for all our members, regardless of specialty, that scientific presentations should be of general interest, that socio-economic topics should be timely and appealing and that entertainment and social functions should be unsurpassed in excellence. Most importantly we have planned with the idea that this convention should be relaxed, should provide ample opportunity for visiting, for renewing acquaintances, and time to discuss the future of our endeavors.

The program reflects this planning; there are six scientific symposiums arranged to reduce conflict with Business Sessions, there are two socio-economic subjects of current significance, on historical presentation of interest to all and of course our featured speaker Al Capp. Social events are similar to previous years with the added attraction of the World Action Singers.

We hope the program will fill the desires of our association and that this will be a successful convention.

The financial aspects of the meeting are not encouraging. Even after maintaining a minimum registration fee the meeting will probably result in a small deficit as reflected in the attached income and expense statement. However, it was the directive of this House of Delegates, in session last year, that the Committee produce a meeting of similar proportion to previous years.

The Board of Trustees has requested that the Planning Committee make a complete study of the Annual Meeting, its purposes and future, and perhaps subsequent meetings will have a different format.

The Chairman wishes to thank the members of the committee for their efforts in making this program possible and especially Stephen Adelson, M.D., who was responsible for arranging the scientific program. We also wish to thank the specialty groups; the Oklahoma Society of Internal Medicine, the Oklahoma Dermatological Society, and the Oklahoma Society of Otolaryngology for planning programs, at their own expense, in conjunction with this meeting.

Please remember that the bulk of the funds for financing the convention came from our exhibitors, we encourage you to visit the booths whenever possible.

Since the Planning Committee will study the Annual Meeting and report to the Board of Trustees, the committee makes no recommendations.

ESTIMATED INCOME AND EXPENSE 65th ANNUAL MEETING April 29-May 1, 1971

Income:

Technical Booth Sales 51 @ 250	$12,750

Institutional & Scientific Booth Sales 14 @ 25.00	350
Registration Fee 500 @ 5.00	2,500
Ticket Sales 250 @ 10.00	2,500
Contributions	2,400
Total Income	$20,500
Expenses:	
General Expense (Printing, Rental, Etc.)	$15,000
Speaker Expense (Honorariums & Expenses)	6,650
TOTAL EXPENSE	$21,650
NET LOSS	$1,150

Report of the COUNCIL ON PROFESSIONAL EDUCATION *(APPROVED AS AMENDED)*

Council Members

Robert J. Hogue, Jr., M.D., Guthrie, Chairman
Richard S. C. Grisham, M.D., Bartlesville
Thomas N. Lynn, M.D., Oklahoma City
Forest D. Harris, M.D., Lawton
Y. E. Parkhurst, M.D., Norman
Lazar Greenfield, M.D., Oklahoma City
John D. Capehart, M.D., Tulsa
Francis A. Davis, M.D., Shawnee
Ralph Buller, M.D., Hydro
Jack W. Parrish, M.D., Seminole
James F. Tagge, M.D., Enid
Dale Groom, M.D., Oklahoma City
R. L. Winters, M.D., Poteau
Larry L. Lowery, M.D., Guymon
Irwin H. Brown, M.D., Oklahoma City

I. INTRODUCTION

The problem of producing medical education programs of interest to Oklahoma physicians is a frustrating and difficult task. This council, after a lengthy meeting early in the organizational year decided to depart from its tradition of conducting "circuit rider" courses (which had been poorly attended) and redefine its role in providing educational programs.

The Council was aware that it did not have the resources to produce scientific programs on par with the Medical Center, Regional Medical Program and the many organizations who conduct specialized programs. We found there was an abundance of courses, covering virtually every subject, available in lecture halls, via T.V., tape and telephone. For these reasons the Council adopted the following goals:

1. Determine by visits with physicians and others involved in medical education, what the medical education needs of Oklahoma physicians were.
2. Co-sponsor medical education programs with others.
3. Act as a catalyst in developing programs, and in some instances conduct programs.
4. Promote AMA's Physician Recognition Award Program.

These goals were pursued with considerable effort. Unfortunately the successes were not as rewarding as expected.

II. ACTIVITIES

A. Visits with Physicians

The Council offered to provide speakers to 45 county medical societies to discuss Peer Review and the Usual, Customary and Reasonable fee concept. We felt there was considerable confusion concerning these topics and arranged with the Insurance Review Committee to make the presentations. Six societies requested and received speakers.

Several communities were selected as potential regional medical education centers. The chairman requested meetings in these areas with interested physicians to see if programs could be initiated. In one instance such a meeting was arranged; however, no programs have developed.

At the request of the Planning Committee, the Council surveyed the physicians in the state who were practicing in small communities alone, and offered a locum tenem program. The proposal suggested a two week relief for vacation and education, without complete loss of income. The medical center agreed to design a special one week course for the physician student based on subject areas he requested. Of 50 communities surveyed 18 responded; 10 physicians were interested; three were selected for a pilot project, none have responded.

B. Co-sponsorship

Meetings were held with representatives of the Medical Center and Regional Medical Program to discuss programs they were conducting with the idea that the Council would help coordinate, promote, and finance programs of mutual interest.

The association continues to partially finance the medical education T.V. series aired weekly on channels 11 & 13. 39 programs were broadcast during the months of September through May totaling 42 hours. (Each program is broadcast twice daily.) It is difficult to assess physician participation in these programs since neither the office of Postgraduate Education or the Council receive much "feedback." The council will re-evaluate this activity next year. In addition to the T.V. series the Council co-sponsored a film entitled "Stop, Look & Listen" with Regional Medical Program.

C. Coordination and Development of Programs

The programs on Peer Review and UCR are examples of how the council can assist in developing and coordinating programs. However other educational pursuits of the association were conducted outside the council. The regional seminars on "Drug Abuse" are an example, the council will develop closer liaison with other OSMA Committees and Councils in the future. The advantage will be to have these programs approved for credit toward the AMA recognition award. While we were unsuccessful in developing new programs, the council feels as additional emphasis is placed on continuing education, new programs will be developed.

D. AMA's Recognition Award

The biggest and most successful undertaking of the Council was the production of a special issue of the OSMA Journal devoted to the Physician Recognition Award and Continuing Medical Education. The September (1970) Issue featured special editorials; an annual calendar of educational programs in Oklahoma and surrounding states; a listing of topics and faculty available for lectures; special emphasis on the award program, with details on requirements and how to apply. This special issue received nation-wide attention and copies were distributed widely. Reprints were mailed to County Society Presidents, Hospital Chiefs of Staff and others interested. Many other states have followed Oklahoma's lead and produced similar issues.

III. OTHER ACTIVITIES

Most states the size of Oklahoma are experiencing problems similar to ours. We have corresponded with states that have unique programs in an effort to devise new opportunities for our membership — Oregon has a compulsory education requirement

for membership in the State Society; California has a tremendous educational program including a unique "Physician-in-Residence Program"; Pennsylvania has created a special institute with multiple financing for medical education purposes.

IV. *CONCLUSION*

The Council needs to know what the membership expects and needs in continuing education. The AMA Recognition Award Program will indicate the interest in "recording" participation in educational programs but may not indicate the true interest of our members in medical education. We feel with the emphasis being placed on "keeping up" by AMA, Specialty Groups and Government that it is necessary for the association to be active in continuing education. The criteria for programs must be developed in a manner acceptable to the practicing physician and the program must be presented in a format and location that is attractive. However, any postgraduate education will require a sacrifice by the physician, and require a commitment and resolve that the extra work is in the best interest of "patient care."

V. *RECOMMENDATIONS:*

1. The Council be permitted to continue seeking new methods for developing Continuing Education Courses.

2. That the House of Delegates endorse the AMA Recognition Award and encourage all OSMA Members to participate in this voluntary program.

3. That the Council be permitted to have a "no host" regional seminar on continuing education, inviting representatives from our neighboring states.

4. That the House request the Board of Trustees to study the impact and feasibility of an educational requirement for continued OSMA membership.

Resolution No. 9
(APPROVED)

SUBMITTED BY: Oklahoma County Medical Society

TITLE: Labeling of Medications

REFERRED TO: Reference Committee No. II

WHEREAS, the number of medications available to the public is dynamically increasing daily, and

WHEREAS, the recognition by the senses of all these medications is no longer possible even for the most astute physician, and

WHEREAS, freedom of choice of physician, and specialization of physicians and gaining the best medical care sometimes demands patients go to several physicians whose records are not often immediately available to each other, and

WHEREAS, incompatibilities of multiple medications are likely for some and augmentation of effects may occur with other combinations, and

WHEREAS, the labeling of medicines would compel more attention by busy physicians and pharmacists to make errors less likely, and

WHEREAS, the labeling of medicines would save a secondary physician precious time in history taking,

Would aid him in determining what medications the secondary physician might safely prescribe,

Would help when patients call at night with records not available to know what medicines are involved, and

WHEREAS, in instances of acute medicine intoxication such as presents in emergency rooms the identification of possible offenders could be expedited if all medicines were labeled

NOW, THEREFORE, BE IT RESOLVED, that the Oklahoma State Medical Association go on record as favoring a state and federal law requiring that all prescriptions be labeled unless the prescribing physician stipulates *DO NOT LABEL (DNL).*

Resolution No. 14
(APPROVED)

SUBMITTED BY: Robert Hogue, Jr., M.D.

TITLE: Blue Shield UCR Program

REFERRED TO: Reference Committee No. II

WHEREAS, the House of Delegates of the Oklahoma State Medical Association in 1967 approved the concept of a UCR program for Blue Shield, and

WHEREAS, in 1968 the House of Delegates approved implementation of such a program, which by its mechanisms, required the physician to accept the fee as finally determined after review by the Oklahoma State Medical Association Medical Insurance Review Committee as payment in full for the service excepting where the physician had an agreement with the patient prior to rendering the service, regarding a fee in excess of usual, reasonable and customary, and

WHEREAS, it is impossible to identify many holders of Blue Shield UCR coverage from their insurance card, and

WHEREAS, a significant opposition has been voiced in the Oklahoma State Medical Association to the physician being obligated under this UCR program, having not been aware that the patient was covered under this kind of program prior to rendering the service, and

WHEREAS, the Prepaid Medical Insurance Committee in their meeting of January 26th, 1969 devised an agreement to allow a physician to not take assignment under the UCR program but to bill the patient directly and let the patient recover from Blue Shield, and

WHEREAS, the House of Delegates of the Oklahoma State Medical Association in 1970 recommended that the Oklahoma State Medical Association Board of Trustees be authorized to negotiate with Blue Shield to find a mechanism whereby physicians can avoid participating in the UCR on an individual case basis if he so desires. This mechanism being in addition to the so-called "agreement in advance" method, and

WHEREAS, such an agreement has not been worked out and available to avoid participation

NOW, THEREFORE, BE IT RESOLVED that Blue Shield shall be required by September 1, 1971 to have, approved by the Prepaid Medical Insurance Committee, and on their forms, a method whereby a physician may choose at the time of filing his claim whether or not he prefers to participate in and be obligated under the UCR program with assignment of benefits to him, or whereby he may elect to non-assignment whereby benefits will be paid to the patient and he will look to the patient for his payment and not be obligated to accept this amount as payment in full.

BE IT FURTHER RESOLVED that after September 1, 1971 the members of this Association shall no longer be automatically obligated under this program as outlined in the agreement passed by the House of Delegates in 1968.

BE IT FURTHER RESOLVED that Blue Shield shall be requested and strongly encouraged to devise

a method whereby it shall be readily apparent on a member's Blue Shield card that they are the holder of a UCR type policy.

Resolution No. 10
(NO ACTION TAKEN)

SUBMITTED BY: Oklahoma County Medical Society

TITLE: Opposition to "Professional Services Review."

REFERRED TO: Reference Committee No. II.

WHEREAS, the Oklahoma State Medical Association has had effective and adequate means to assure the public a very high quality of medical care provided by qualified physicians, and

WHEREAS, the major feature of these means consists of mandatory adherence to the principles of medical ethics through a forceful system of internal discipline which is acceptable to the members, and

WHEREAS, the imposition of regulations emanating from the United States Government and its agents under the designation of "Professional Services Review" might preempt, disrupt, and invalidate the State Association's internal disciplinary mechanisms, and

WHEREAS, participation in said "Professional Services Review" by the Oklahoma State Medical Association and its members would constitute violation of the very purpose of the Association, therefore be it

RESOLVED, that the Oklahoma State Medical Association shall not participate in any program of "Professional Services Review" (typified by the Bennett Amendment) and further be it

RESOLVED, that we are opposed to the principle of peer review by other than our peers, and further be it

RESOLVED, that in the realization that *intolerably rigid regulations* are necessary and inevitable consequences of government subsidized medical care, (Oklahoma State Medical Association members would be well advised not to participate in government-subsidized medical care programs.) and further be it

RESOLVED, that the Delegates of the Oklahoma State Medical Association be instructed to introduce and support this or a similar resolution to the House of Delegates of the American Medical Association.

Report of the FOUNDATION FOR PEER REVIEW STUDY COMMITTEE

(APPROVED)

Committee Members

H. E. Denyer, M.D., Bartlesville, Chairman
Rex E. Kenyon, M.D., Oklahoma City
Howard Keith, M.D., Shattuck
Lucien M. Pascucci, M.D., Tulsa
Scott Hendren, M.D., Oklahoma City
Ed L. Calhoon, M.D., Beaver

Background

At the present time, there are at least three bills pending before Congress to initiate a massive nationwide system of peer review as pertaining to principal government health care programs. Two of these bills provide that peer review shall be carried out by physicians, while the third would involve laymen in the review process.

Because of the seriousness of these proposals, the OSMA Committee on Planning discussed them at length on two occasions, and surveyed other state medical associations regarding their attitudes and plans for becoming involved in the implementation of a large-scale peer review program. It was learned that a high percentage of medical societies will become involved in any program which emerges from Congress, not because they favor bills of this type but rather because they don't want to see peer review fall into non-professional hands.

The Committee on Planning reported its findings to the OSMA Board of Trustees on March 14th and the Board appointed the Foundation for Peer Review Study Committee. The new committee was given the task of preparing a preliminary report for presentation to the House of Delegates at this annual meeting.

Last Fall, the U.S. Senate Finance Committee adopted the so-called Bennett Amendment to the Social Security Act. This measure — to establish a nationwide peer review system — did not clear the Congress prior to adjournment, but some form of it is expected to become law this Spring.

Because Washington observers are confident that the Bennett approach to peer review is the most likely legislative proposal to become law, this report is limited to an explanation of the Bennett Amendment and a discussion of its potential implementation in Oklahoma.

The Bennett Amendment

The amendment requires the Secretary of Health, Education and Welfare to contractually designate "Professional Standards Review Organizations" throughout the country by January 1, 1972. Each PSRO jurisdiction defined in geographic or medical service area terms, would have to represent a minimum of 300 practicing physicians. In smaller states, the designations will probably be on a statewide basis, but it would be possible to delegate the review function to some large regional subdivisions of the PSRO.

The purpose of the Bennett Amendment is to promote efficiency and economy in the delivery of health care services, particularly of Medicare and Medicaid, "through application of suitable procedures of professional standards review."

PSRO's would have the responsibility to review all Medicare and Medicaid claims to assure that services conform to appropriate professional standards (quality), and that payment is only made for medically necessary services (overutilization) and, in the case of inpatient services in a hospital or other health care facility, that the services could not have been rendered on an outpatient basis or in a facility of a different type. Some elective admissions would have to be approved by the PSRO in advance.

As to the selection of a PSRO in a given jurisdiction, a non-profit professional association demonstrating ability and willingness to participate would have priority for purposes of entering into an agreement with the Secretary of HEW. However, a medical society itself could not enter into an agreement; it would have to be a foundation established by a medical organization which would be open to the participation of all members of the medical organization or to other practitioners eligible for such membership. If the medical association declines to establish a foundation for peer review, then the Secretary of HEW can enter into an agreement with such other organizations or governmental agencies having the ability to provide professional review of governmental health care claims.

PSRO's will be required to screen all claims against "norms" of care

appropriate to any illness or health condition in order to determine compliance with standards of quality, medical necessity and choice of health care facility. The norms will be handed down from the Department of Health, Education and Welfare, but modifications to meet local conditions are possible on a negotiated basis. No claims for health services can be paid until they have been screened by PSRO.

In addition to the use of norms to provide prepayment screens for services rendered, the Bennett Amendment also requires postpayment studies to isolate "patterns of practice" which may not comply with acceptable standards.

The Secretary will provide assistance to the PSRO in getting established, and operational expenses will be paid by the Secretary from Title XVIII (Medicare) trust funds and from Title XIX (Medicaid) appropriations. The Department of HEW will provide "prototype" plans for the use of PSRO's.

All claims review, under the terms of the Bennett Amendment, must be done by professional persons. It is provided that economical and efficient computer resources already existing in carriers and intermediaries would be used to the greatest extent possible. However, the bill specifically provides that authority for operation of the review system shall be totally vested with PSRO. In other words, the carrier or intermediary could provide the computer technology necessary to screen claims against parameters, but the peer review function would remain with the PSRO.

Discussion

Your committee believes that the Bennett Amendment is a bad bill, a cure for a problem which has been grossly magnified out of proportion to reality. Yet it is clear that organized medicine does not have the power to defeat this measure or even to alter it in a more realistic and sensible fashion.

Many county and state medical societies, confronted with the same dilemma, have begun establishing foundations in order to assume control of the Bennett Amendment in their jurisdictions. Your committee has studied a score of these plans. Basically, they fall into three categories: (1) Foundations established to provide peer review and to set standards for health insurance in their areas; (2) Foundations which not only provide peer review but also act as insuring organizations; and (3) Foundations which are limited in function to the peer review process.

If the House of Delegates believes that the association should assume control of the Bennett Amendment in Oklahoma, then members of the committee feel very strongly that the function of an OSMA directed foundation should be restricted to peer review. We also feel that participation by physicians in the foundation should be voluntary, that peer review should be carried out by professionals only, that the governing board of the foundation should be the Board of Trustees of the OSMA, and that it would be preferable to have a single PSRO for the state with the permissive proviso that the review authority could be delegated to qualified sub - regional groups working under the terms of the state plan.

Our involvement in the Bennett Amendment will not only be a monumental undertaking but there is every chance that it will be a bitter experience. At the outset, the government will probably give a medical society PSRO sufficient latitude to exercise true professional judgment in appraising medical care claims, but the experience of the past indicates strongly that a flow of restrictive regulations from Washington will gradually reduce our ability to make equitable decisions.

At the same time, the alternative to our involvement appears even more bleak. If we decline to participate as an organization, we will simply open the door for another group to assume control; a group which may be well-meaning but which cannot be representative of the state's practicing physicians.

Regardless of who assumes control of the Bennett Amendment, there will be trouble within the profession because never in its history will medicine be subjected to so many controls.

Time is of the essence. If it is the decision of the House of Delegates to assume control of the Bennett Amendment, then a committee of the association will need considerable time to make an in-depth study of the law and regulations — to confer with carriers, intermediaries and outside consultants — and to prepare articles of incorporation and bylaws to establish the required foundation.

Your committee is not in a position to make a strong recommendation with respect to this problem; we can only report to you the advantages and disadvantages of becoming actively involved or defaulting to another peer review organization. However, in order to give the House of Delegates an issue to decide, the following recommendations are introduced for purposes of discussion and action.

Recommendations:

1. It is recommended that the House of Delegates authorize the Foundation for Peer Review Study Committee to develop a program of implementation for any peer review law which may emanate from Congress, utilizing all possible advice and counseling, and to present this program to a special called meeting of the House of Delegates for ratification, amendment or rejection.

2. It is recommended that if a law is passed during the planning process, the President of the Oklahoma State Medical Association shall have the conditional authority to write a letter of intent to participate to the Secretary of Health, Education and Welfare, with the proviso that the final plan of implementation is subject to review by the House of Delegates.

Report of the COUNCIL ON PUBLIC POLICY *(APPROVED)*

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SECTION I
THE COUNCIL

The report of the Council on Public Policy must necessarily take the form of a review of Federal Legislation as it relates to Medicine; since the Council's principle function this year has been to follow and report on such activity.

The Social Security Amendments of 1970, HR 17550 have received major attention. While many sections of this bill are important to us as a profession, two have received the greatest notice. One section would limit professional fees to 75 percent of the prevailing in a given area, representing a reduction from the 83rd percentile level. While legislated fee control is always of concern, it must be stated that few physicians would be individually affected by this provision; since most fees already fall within the 75th percentile of prevailing.

Principle attention has been focused on Section 227, which provides for a "Program Review Team," formed of professionals and consumers, which would review not only fees and utilization, but standards of medical care. This section grew from the Administration's Health Cost Effectiveness Amendments, and is presented in almost identical language. The concept of legislated peer review really is an outgrowth of the turmoil which followed publication of the Staff Report to the Senate Finance Committee on Medicare and Medicaid, with particular reference to alleged abuses.

HR 17550 was passed by the House in May 1970, and died in the Senate Finance Committee with the end of the 91st Congress. It has been re-introduced as HR 1, into the 92nd Congress, by Senator Wilbur Mills of Arkansas.

It seemed obvious, with passage in the House, and from subsequent debate in Senate Finance, that Congress would pass some sort of legislated peer review. Strong indication of that intention was given AMA Representatives by Chairman Long when they testified before Senate Finance in support of the AMA's Medicredit Program. As a result, our Peer Review Organization (PRO) was added as Part III of the Medicredit Bill. This has subsequently been dropped, due in part to pressure from various State and County Medical Societies and in part to legislative timing.

During debate in the Senate Finance Committee, Senator Bennett introduced his *Professional Services Review Organization Amendment* (PSRO) which had many objectionable features, including 1) no guarantee of medical control; 2) pre-certification for institutionalization; 3) a $5,000 fine (in lieu of suspension from participation in the program) for first time offenders; and 4) Federal ownership of records. The Amendment was strongly opposed by AMA and OSMA. There is, however, little doubt that it will be re-introduced when HR 1 reaches the Senate Finance Committee; and Washington observers feel it will probably replace Section 227 to become law.

The AMA Medicredit Program has been introduced into the 92nd Congress, and is receiving considerable support. This bill proposes a graduated series of income tax credits for the purpose of purchasing voluntary health insurance from private com-

panies. In brief, families with no tax liability would be given a voucher to buy such insurance. Families with greater than $1,000 tax liability would receive no tax credit; and those between $0 and $1,000 would receive direct tax credit in a graduated percentage from 99 percent to 10 percent. Catastrophic coverage would be included with a "corridor" existing between basic coverage and catastrophic coverage . . . this, too, being based on income. As stated before, the PRO portion of the bill has been dropped.

During the 91st Congress, Senator Kennedy (D, Mass.) and Representative Griffiths (D, Mich.) individually introduced bills for national compulsory health insurance. The two bills were stimulated largely by Walter Reuther's "Committee of 100" and the AFL-CIO respectively. Both bills died with the close of Congress. Fine points of difference have been resolved, and Kennedy and Griffiths have introduced into the 92nd Congress identical bills, S. 3 and H.R. 22. These proposals call for a complete system of compulsory health insurance financed through a 3½ percent payroll tax on employers, a 1 percent payroll tax on employees (on a base up to $15,000) with some 40 percent coming from general revenues. Benefits would include institutionalization, physicians' fees, dental fees (up to age 16), certain prescription drugs, etc. Physicians could elect to be paid by 1) salary; 2) capitation; or 3) fee-for-service, with the stipulation that the first two categories would be paid first, and the fee for service group paid from residuals "on a pro-rata basis." The bill could create a National Health Security Council which ultimately would provide for national standards of health care, compulsory education, federal licensing, etc. Observers feel the legislation has little chance of passage during this session of Congress, but feel a greater effort will be made for passage during 1972.

Senator Javitz (R., N.Y.) has supported legislation extending the benefits of Medicare to all segments of the population over the next four years, beginning with younger groups.

Representative Durward Hall (R., Mo.) has introduced legislation transferring Medicaid to private insurance carriers and providing for catastrophic benefits for all the population.

The Administration's Health Proposals have not been received in Bill form, but would include mandatory purchase of health insurance for employees by employers and strong support for Health Maintenance Organizations (HMO's).

Time does not permit a detailed summary of all of the many pieces of legislation studied individually by members of this Council. It goes without saying that Health Care, the delivery of same, and its financing will be a major political issue in 1972. The Council makes no recommendations to the Board of Trustees or to the House of Delegates at this time, save being constantly on the alert.

Most certainly, we must improve our Congressional liaison through increased political support. We must be informed, and we must begin to develop a public information program.

SECTION II
STATE LEGISLATIVE COMMITTEE

The Association's legislative program has three essential functions: (1) study carefully all bills introduced that affect medicine and arrive at consensus position by committee vote (2) actively support our position by testifying and lobbying (3) introduce legislation that corrects deficiencies that affect the public's health.

To carry out these functions properly requires much of the time of your executive staff, a considerable amount of time by your committee, and a lot of cooperation and support from interested physicians. This report will discuss these functions briefly in order that you will know the importance of this committee's activities.

STUDYING LEGISLATION

In each succeeding legislature an increasing volume of bills are introduced. Already this session 767 proposals have been filed. Each of these have to be read to determine if they affect medicine. After the initial screen those bills of interest are selected for review by an executive committee of the Legislative Committee. After discussion the bills of most interest are researched. Information is gathered, legislators are contacted, and vested interest groups are appraised of the bill. Of the 767 bills being considered by the legislature, 50 are of sufficient import to warrant close scrutiny by your committee.

After all possible information is acquired a member of the committee is asked to study the proposed legislation and report a recommended position. March 28th, in a five hour meeting, your committee established positions on 40 bills.

SUPPORTING A POSITION

The State Capitol is one of the largest forum for debate since Rome. Arguments must be prepared carefully, presented forcefully and defended vehemently. Literally hours are spent developing a statement or preparing strategy to pass or defeat a bill. Unfortunately most people think that all the lobbying is done at the capitol. The facts are, that the majority of these issues are settled in home town coffee shops, pharmacies, doctors' offices, etc. That's the reason it's vital that members of the profession know and understand the association's position. Each week the committee publishes a "Legislative Reporter" for 200 physicians who have a special relationship with members of the legislature. This report gives a synopsis of the bill and our position and periodically appeals for action. In addition, articles are written for *The Journal* and *Newsletter*.

INTRODUCING LEGISLATION

This year the Association will have introduced bills to require that members of the Healing Arts in Oklahoma be graduates of schools approved by the U.S. Office of Education or have passed a basic science exam equivalent to Oklahoma's. There will also be proposed a bill to limit the period of discovery in personal injury and damage cases. The committee tries to stay aware of needed legislation but so much of our time is spent on the defensive it is difficult to achieve the offensive.

The responsibilities of this committee are demanding, frustrating, and fortunately, at times gratifying. A one sentence V.D. bill enacted into law may result in a decrease to the skyrocketing venereal disease rate . . . a relatively obscure immunization bill will result in Oklahoma children being better protected . . . Amendments to the "Good Samari-

tan Act" could result in better care for the emergency patient. Another law would provide jobs for many chronically ill and partially disabled persons. These are good bills which would be worthy additions to Oklahoma law but are violently opposed because they are misunderstood.

You should be cognizant of the fact that the chriopractic profession would legislate itself into health insurance laws. They are strong politically and because they stand to gain economically they will try hard. There are other vested interest groups that would achieve by legislation what they have not achieved by education.

The committee wishes to thank those members who have responded to our requests for aid, we urge every member of the association to become interested and involved in the affairs of this committee. The "Doctor of the Day" program is an excellent exposure to state politics and any physician wishing to donate a day during the session should contact the association office.

We have worked with state agencies and other health related organizations in our legislative program. We feel that all medical issues are the proper concern of our association and that proper patient care has no organizational boundaries. Your Medical Political Action Committee (OMPAC) has made a significant impact on the Legislature; many candidates now in office were recipients of OMPAC's Contribution. It's important that lawmakers know that physicians are interested in good government and are willing to contribute financial aid to get it. We heartily endorse your individual support of OMPAC.

As the legislative workload becomes heavier, it will become increasingly important that you spend more of your time in political activities, we encourage you to help—we need your help.

Following is a list of the most important bills and our position. Copies of bills and justification of our position are available to all members on request.

House Bill 1042 by Cate — Amends the "Good Samaritan Act" to limit the liability of health personnel when "emergency care" is rendered "wherever required." Position: Support.

House Bill 1100 by McCune — The Uniform Controlled Dangerous Substances Act — defines dangerous substances and regulates the manufacturing, distributing, dispensing, prescribing, administering and use of controlled substances. Establishes a Commissioner of Narcotics and Dangerous Drugs Control. Provides for an Advisory Board. Provides for offenses and penalties. Position: Support with amendments.

House Bill 1101 by McCune — Provides for comprehensive programs on drug abuse and establishes a drug treatment and rehabilitation authority. Position: Support.

House Bill 1169 by Poulos — Requires every licensed hospital to provide up to 48 hours emergency treatment for any patient regardless of race, creed, color or ability to pay. Position: Oppose.

House Bill 1194 by Cox—Authorizes the Commissioner of Health to adopt Rules and Regulations governing ambulances and ambulance operators. Position: Oppose.

House Bill 1210 by Taggart — Provides that if a health insurance contract covers the services within the lawful scope of a licensed psychologist, then the insured shall have the right to select any licensed psychologist. Position: Oppose.

House Bill 1224 by Musgrave — Provides that an employee covered by workmen's compensation who has a specified disease or impairment may waive his compensable rights upon approval of the Industrial Court. Position: Support.

House Bill 1225 by Musgrave—Establishes a medical panel to aid the Industrial Court in certain workmen's compensation cases wherein there is a divergence of medical opinion. Position: Support.

House Bill 1238 by Sparkman — Provides for the removal and reappointment of members of the Board of Health. Creates a nine man board consisting of four M.D.s, two D.O.s, one Dentist, one Hospital Administrator, and one veterinarian. Position: Oppose.

House Bill 1331 by Finch — Provides that an injured employee covered by workmen's compensation may select the services of a physician qualified and licensed in the event the physician provided by the employer is not satisfactory to the injured employee. Position: Support.

House Bill 1346 by Mountford — Levies a tax on Insurance premiums. This would increase the Insurance costs on Casualty and Health Ins., especially Blue Cross & Blue Shield. Position: Oppose.

House Bill 1384 by Finch — Would require that all health insurers cover the services of all "Practitioners of the Healing Arts"; that each "Practitioner" be compensated on the basis of prevailing charges in the community (chiropractic equated with M.D.s) and that the services may be performed at a facility chosen by the insured. Position: Oppose.

House Bill 1396 by Finch — requires that chiropractic services be included in the terms of contracts for covering health and accident benefits to insureds residing in Oklahoma. Position: Oppose.

House Bill 1401 by York—Requires that before conducting an autopsy, notification in writing shall be given to a survivor as listed; and that a copy of the autopsy report shall be furnished a survivor. Position: Oppose.

House Bill 1408 by Hill — Amends the statutes dealing with penalties for abortion. Provides that a duly licensed physician may perform an abortion with the consent of the female within 15 weeks from the commencement of the pregnancy. Position: Oppose.

House Bill 1418 by Kilpatrick — permits the introduction as evidence in a court proceeding "Published treatise, periodical or pamphlet on subjects of history, science, medicine or art . . ." Position: Oppose

Senate Bill 10 & 71 by Baggett — Appropriates $50,000 to the Oklahoma Rural Medical Education Loan and Scholarship Fund. Position: Support.

Senate Bill 112 by Breckinridge — Repeals the Occupational and Professional Licensing Acts of 25 state boards and agencies including medical examiners. Creates new boards of five members; three members of the profession — two laymen. Makes boards advisory and provides for a director appointed by the Governor. Position: Oppose.

Senate Bill 161 by McSpadden — Provides for the removal and reappointment of members of the Board of Health. Creates a nine man board

consisting of four M.D.s, three D.O.s, one Dentist, and one Hospital Administrator. This is almost identical to House Bill 1238. Position: Oppose.

Senate Bill 168 by Stipe — Amends the "Good Samaritan Act" to provide that contributory negligence may not be pleaded or proved as a defense in civil action. Position: Oppose.

Senate Bill 231 by Dahl — Would remove lawyers, doctors, engineers, geologists, accountants and other professional persons from the merit system. Position: Oppose.

Senate Bill 244 by Stipe — Provides that any person suffering injury or death as a result of medical care, treatment or diagnosis under the Oklahoma Workmen's Compensation Act shall be entitled to bring action against the responsible party. Position: Oppose.

Senate Bill 261 by Stipe — Would permit an injured employee covered under workmen's compensation to select a physician, surgeon, or chiropractor of his choice. Position: Oppose.

Senate Bill 262 by Stipe — Would require that all health insurers cover the services of all "practitioners of the healing arts"; that each "Practitioner" be compensated on the basis of prevailing charges in the community (chiropractic equated with M.D.s) and that the services may be performed at a facility chosen by the insured. Position: Oppose.

SECTION III
PUBLIC RELATIONS COMMITTEE

During the past year your Public Relations Committee has continued or undertaken several different projects. Activities have been as follows:

1. The association's seven year old weekly health column, "A Message From Your Doctor," continues to be carried by about 40 state newspapers each week. Last year your committee changed the format of the health column from that of a health feature article to a question and answer article. Due to lack of "interesting" questions from the readership, we found it necessary to go back to the health feature format. If your association found it necessary to purchase the amount of newspaper space devoted to the health column each year it would cost approximately $25,000. The column is produced solely by the OSMA staff.

2. Your committee is continuing its liaison with the OSMA Legislative Committee as regards the "Legislative Doctor of the Day" program. A story is produced for each participating physician's hometown newspaper and released the week prior to his day of service. The story serves a two-fold purpose by (a) informing the doctor's patients that he will be out of his office on a certain day, and (b) creating a good public relations image for the association. Sixty-five such stories have been produced and mailed thus far during the Legislative session.

3. Your association's monthly news letter, *OSMA News*, is now in its fifth year of publication. It is a six page newsletter published nine months each year beginning in September and ending the following May. The newsletter is devoted to socio-economic news of interest to the physician and the members of his household and is mailed directly to the member-physician's home.

4. During the past year the OSMA again participated in the promotion of national Community Health Week in cooperation with the AMA. The week was set for October 18-24 with program emphasis on health careers and nutrition. OSMA's participation consisted of special radio spot announcements, television spot announcements, newspaper feature articles, news stories and newspaper ads. The newspaper ads were distributed to each county medical society PR chairman for presentation to local newspapers. Only one ad was reported to the association, but the committee is sure that several others must have been placed.

Your association's primary activity for Community Health Week was a seven day "Mini Health Fair" located in Shepherd Mall · Shopping Center, Oklahoma City, October 8-14. Thirty-six exhibits on health subjects were on display by 29 health related organizations. The entire project was coordinated by the OSMA. It was estimated that over 65,000 people visited the exhibits during the fair.

Anticipating that the association might like to conduct a similar project in the coming year, your committee has taken the liberty of reserving the AMA's two most popular exhibits, "The Transparent Twins" and "Life Begins." As a basis for another Health Fair, these two exhibits will assure a large crowd turnout.

5. Numerous special projects were undertaken throughout the year, such as press conferences, reaction stories to news events, and working with newspaper writers or reporters in conceiving, researching and placing medical stories in major news media. In addition, your association has answered hundreds of telephone and written requests for information on health subjects.

6. Your committee, in cooperation with the Oklahoma County Medical Society, is attempting to start a pilot project radio program in the Oklahoma City area. The program will use a "Ask Your Doctor" format to solicit questions from the listening audience. Answers to the questions will be researched and then answered by an anonymous voice. Lag time between the receipt of the question and its answer over the air will be one or two weeks. Each "Ask Your Doctor" spot will only be one to two minutes in length . . . just enough time to ask the question, answer it, and put in a brief public service type announcement. If the pilot project proves successful, this service will be offered to other radio stations throughout the state.

SECTION IV
MEDICAL HERITAGE COMMITTEE

At long last your Medical Heritage Committee has begun the actual collection of medical paraphernalia with the ultimate aim of displaying such in an appropriate way to depict medical history in Oklahoma. A number of items are now in storage in the OSMA Executive Office Building. This storage space was offered for committee use by the OSMA Board of Trustees just before the last annual meeting.

The Medical Heritage Committee is in the process of working with the Woman's Auxiliary to facilitate local collection of articles, equipment, manuscripts, etc., at the county level. These items can then be collected and brought to a central location. This will assure that items which might be lost through the distribution of an estate or in some other manner will be preserved for our use.

Recommendations:

1. It is recommended that the OSMA House of Delegates urge and encourage all Oklahoma physicians to seek out and preserve, as best they can, the artifacts and manuscripts that best depict the medical history of this state. Members obtaining such material should notify the Medical Heritage Committee of its existence and location.

Report of the MEDICAL SCHOOL LIAISON COMMITTEE

(APPROVED AS AMENDED)

Committee Members

Harold W. Calhoon, M.D., Tulsa, Chairman
P. D. Casper, M.D., Del City
C. L. Tefertiller, M.D., Altus
James R. Taylor, M.D., Bartlesville
Robert S. Ellis, M.D., Oklahoma City
Jed E. Goldberg, M.D., Tulsa
Harlan Thomas, M.D., Tulsa
Clifford A. Traverse, M.D., Oklahoma City
Mrs. J. Hartwell Dunn, Oklahoma City
Oliver H. Patterson, M.D., Sapulpa
J. William Finch, M.D., Hobart
G. Rainey Williams, M.D., Oklahoma City
M. Boyd Shook, M.D., Oklahoma City
Jack T. Dancer, M.D., Shattuck
C. Riley Strong, M.D., El Reno
Herbert W. Truett, M.D., Tahlequah
M. E. Robberson, M.D., Wynnewood

During the past year your Medical School Liaison Committee has conducted three projects for the association. All involved medical students and were in compliance with the House of Delegates directive that the committee serve as liaison with the Student American Medical Association Chapter at the Medical School.

The first project, Medical Education and Community Orientation (MECO), was designed to offer hospital employment to first and second year medical students. In essence the program provided eight weeks of summer employment in a hospital with supervision by local physicians. Fifteen state hospitals expressed an interest in the project and nearly thirty students had been employed when this report was written. The students will not actually begin work until the first of June.

The second project has become an almost yearly function of your committee, summer employment for medical students in physician's offices. All physicians in the state were queried as to whether or not they would like to hire a medical student to work with them during the summer. At the time this report was written nearly twenty-five positions had been secured. It is expected that an additional 25 job opportunities will be located before summer begins.

While your committee was soliciting information on job opportunities, the O.U. SAMA Chapter was surveying the student body to determine who needed summer employment and where they would like to work. As employment opportunities become available the students are matched with the jobs and instructed to contact the physician directly.

On April 4th the third function of the committee took place. At that time a special seminar on medical law and ethics was conducted for the fourth year students at the O.U. Medical School. The seminar was scheduled to coincide with the start of Spring break. Its purpose was to give the medical students enough information on law and ethics so that they would be prepared to take the state and national medical boards. George Garrison, M.D., spoke on medical ethics, while the medical law portion was given by George Short, Attorney, Defense Counsel for the Insurance Company of North America.

During the past year your committee also concerned itself with the admissions policies and procedures being used by the O.U. Medical School. Some criticism had been made that perhaps the medical school was tending to recruit students that were academically inclined, over those that might be more inclined to go into private practice.

Your committee met with the Committee on Admissions of the medical school and was somewhat disturbed to find that medical students are serving as full members. Your committee also observed that very few physicians from outside the Oklahoma City area were members.

Your committee offers the following recommendations for consideration:

Recommendations:

1. It is recommended that the Medical School Liaison Committee name be changed to Medical Center Liaison Committee. This new name would be more appropriate to the committee's function.

2. It is recommended that the OSMA offer to submit a slate of nominees for positions on the Medical School Committee on Admissions. The nominees would be selected by the OSMA Board of Trustees and must pledge to serve actively on the committee before their name is officially submitted. It is understood that membership on the committee is selected by the O.U. Medical School faculty. The slate of nominees should be presented to the faculty with the OSMA recommendation.

It is further recommended that medical students be allowed to serve on the Committee on Admissions in an advisory capacity only. And further it is recommended that the present ratio of full-time faculty and practicing physicians on the committee be maintained.

3. It is recommended that consideration be given to develop a method for more active participation of physicians from over the state on the Committee on Admissions.

Report of the COUNCIL ON PROFESSIONAL AND INTERVOCATIONAL RELATIONS

(APPROVED)

Council Members

Orange M. Welborn, M.D., Ada, Chairman
M. Joe Crosthwait, M.D., Midwest City
R. Barton Carl, M.D., Oklahoma City
E. Edwin Fair, M.D., Ponca City
Mrs. James V. Miller, Ardmore
Joe L. Duer, M.D., Woodward
Frank W. Clark, M.D., Ardmore
Elder D. Padberg, M.D., Ada

Cults and Quackery Committee

M. Joe Crosthwait, M.D., Midwest City, Chairman
Julius L. Scales, M.D., Alva
Edward W. Allensworth, M.D., Vinita
Robert L. Shore, M.D., Lawton
Irwin H. Brown, M.D., Oklahoma City
Bailey L. Dietrich, M.D., Guymon
Floyd T. Hubbard, M.D., Henryetta
William R. Coutant, M.D., Bartlesville

Mrs. E. Cotter Murray, Oklahoma City
Jack D. Spencer, M.D., Oklahoma City
William R. Turnbow, M.D., Tulsa
Joe C. Horton, M.D., Frederick
Sidney Traub, M.D., Oklahoma City
E. A. McGrew, M.D., Norman
David Carson, M.D., Fairland
Kenneth L. Peacher, M.D., El Reno
Robert Melichar, M.D., Tulsa

Committee on Health Related Professions

Edgar W. Young, M.D., El Reno, Chairman
Francis R. First, M.D., Checotah
Hayden H. Donahue, M.D., Norman
Thomas E. Rhea, M.D., Idabel
John A. McIntyre, M.D., Enid
B. C. Chatham, M.D., Chickasha
Robert J. Hogue, Jr., M.D., Guthrie

Medical-Dental Liaison Committee

Lucien M. Pascucci, M.D., Tulsa, Chairman
H. E. Denyer, M.D., Bartlesville
James B. Eskridge, III, M.D., Oklahoma City
Rex E. Kenyon, M.D., Oklahoma City
Harold W. Calhoon, M.D., Tulsa
Marvin K. Margo, M.D., Oklahoma City

Medical-Legal Relations Committee

R. Barton Carl, M.D., Oklahoma City, Chairman
Walter E. Brown, M.D., Tulsa
Don Halverstadt, M.D., Oklahoma City
Marvin K. Margo, M.D., Oklahoma City
Richard G. Dotter, M.D., Oklahoma City
James H. Holman, M.D., Altus
Marion C. Wagnon, M.D., Del City
Ollie W. Dehart, M.D., Vinita
Edgar W. Young, Jr., M.D., El Reno
Frank R. Michener, M.D., Lawton
J. F. Messenbaugh, III, M.D., Oklahoma City
Thomas E. Acers, M.D., Oklahoma City
James L. Luke, M.D., Oklahoma City

Medicine and Religion Committee

E. Edwin Fair, M.D., Ponca City, Chairman
John W. Marks, M.D., Beaver
Adolph N. Vammen, M.D., Tulsa
W. George Long, M.D., Purcell
J. Hartwell Dunn, M.D., Oklahoma City
Martin H. Andrews, M.D., Oklahoma City
Charles E. Green, M.D., Lawton
Ernest G. Shadid, M.D., Norman
Mrs. W. J. Williams, Bethany
Elvin M. Amen, M.D., Bartlesville
R. Palmer Howard, M.D., Oklahoma City
Duane E. Brothers, M.D., Tulsa
Boyd K. Lester, M.D., Oklahoma City
Charles M. O'Leary, M.D., Oklahoma City
Milton Berg, M.D., Tulsa
Jim H. Earls, M.D., Oklahoma City

Committee on Nursing

Joe L. Duer, M.D., Woodward, Chairman
Frank H. Austin, M.D., Lawton
Wm. R. Cheatwood, M.D., Duncan
Mrs. Port Johnson, Muskogee
James L. Haddock, M.D., Norman
C. S. Lewis, M.D., Tulsa
Frank D. Chapman, M.D., Bristow
R. L. Austin, M.D., Oklahoma City
William O. Davis, M.D., Cushing

Committee on Osteopathy

Frank W. Clark, M.D., Ardmore, Chairman
Bob Rutledge, M.D., Oklahoma City
Charles W. Letcher, M.D., Miami
Stanley R. McCampbell, M.D., Oklahoma City
Dave E. Van Wormer, M.D., Tulsa
E. L. Buford, M.D., Guymon
Robert M. Shepard, Jr., M.D., Tulsa
Mrs. Ross Rumph, McAlester
E. L. Leonard, M.D., Wagoner
E. E. Shircliff, M.D., Oklahoma City
John A. Blaschke, M.D., Oklahoma City
H. A. Masters, M.D., Tahlequah
Beryl D. Henwood, M.D., Collinsville
Kelly West, M.D., Oklahoma City

Committee on Pharmacy

E. D. Padberg, M.D., Ada, Chairman
W. B. Renfrow, M.D., Oklahoma City
Robert I. Lubin, M.D., Tulsa
J. F. Hammarsten, M.D., Oklahoma City
Daniel M. Lane, M.D., Oklahoma City
John R. Smithson, M.D., Dewey
H. L. Ratliff, M.D., Pawnee
Cecil Meares, M.D., Muskogee
William G. Harvey, M.D., Beaver

THE FOLLOWING ARE REPORTS FROM COMMITTEES WHICH HAVE TAKEN REPORTABLE ACTION DURING THE YEAR.

SECTION I
THE COUNCIL

Liaison between the Medical Association and other professional and vocational organizations is maintained through the Council on Professional and Intervocational Relations. All of the committees which are a part of this council have this as their prime goal, with the exception of the Committee on Cults and Quackery.

During the past year the various committees of the Council have continued their liaison activities with the members of the legal profession, clergy, nurses, osteopaths, dentists, pharmacists, and health related professions. This council gives the association an agency by which minor problem areas between and among medical groups and other professional organizations can be prevented from becoming major problems.

The exception to the liaison activity of the Council is found in the Committee on Cults and Quackery. This committee serves as a watchdog over the activities of chiropractors and other cultists in Oklahoma. Its main function is to provide, when needed, information to the general public and the profession about the cultists and quacks.

Two new functions were assigned to the Council this year in the form of the Dental Liaison Committee and the Committee on Health Related Professions. These will be discussed further in separate committee reports to follow.

SECTION II
CULTS AND QUACKERY COMMITTEE

During the past year the Committee on Cults and Quackery has continued to compile a document file on the practice of chiropractic in Oklahoma. The latest addition to the file is a "fact sheet on chiropractic" which was placed in the public record of the U.S. Senate Finance Committee on September 15, 1970, by the AFL-CIO. The fact sheet was introduced to document the AFL-CIO's opposition to the inclusion of chiropractic in the Medicare program.

Another function of the committee this past year was to locate by city and county of operation all chiropractors in the state. Based on 1969 license renewals, there are approximately 340 chiropractors in the state. An additional 200 hold state license, but reside in other states.

Representatives of your committee attended a regional AMA meeting on cults and quackery in Phoenix, Arizona late last year. Specific state actions were discussed and recommended at that time. The two bills

reported below resulted from the meeting.

The committee recommended that the OSMA Legislative Committee consider the introduction of two bills into the state legislature. The first bill would require that all members of the healing arts be graduates of schools accredited by either the National Commission on Accrediting or the Office of Education of the Department of Health, Education and Welfare. The second bill would prohibit advertising by any member of the healing arts.

The AMA's Department of Investigation reported that approximately fifteen different states were going to introduce the accredited school bill. The department pointed out that at the present time no chiropractic school is recognized by either of the named organizations.

The OSMA Legislative Committee was asked to prepare the two bills and to hold them until such time as the Legislative Committee determined that their introduction would be most beneficial.

SECTION III
COMMITTEE ON HEALTH RELATED PROFESSIONS

This is one of the newest committees of the association. It was formed in January of this year in order to give the association an appropriate liaison group to deal with the emerging health related professions, such as physician's assistants.

At the date of preparation of this report, a formal meeting of this committee has not been held although informal discussions and background study necessary to initiate action have been encouraged.

At the present time there are two physician assistants training programs underway at the University of Oklahoma Medical Center. There are nearly twenty different programs throughout the United States designed to train physician's assistants to some level of competence.

Meanwhile, four new rules were adopted by the Oklahoma Board of Medical Examiners concerning physician's assistants. The new rules are as follows:

1. To qualify as a physician's trained assistant (59 O.S. 1961 § 492), any person must be either (a) trained by a licensed physician for specific duties in his office under his direct supervision; or (b) receive instructions equivalent to a baccalaureate degree at an institution devoted to education in medical sciences.

A physician's trained assistant is an individual who assists a physician in his usual practice of medicine and whose activities require an understanding of the diagnosis and treatment of disease but do not require professional or advanced training in medical science. Evidence of adequate instruction in basic science and clinical experience received at an institution (or in an educational program) devoted to medical science shall be presented to the Board for evaluation. Each applicant must be certified by the training institution or program as competent to function as an assistant to a physician. Such individual must perform his duties under the direct supervision of a physician licensed by the State Board of Medical Examiners of Oklahoma and does not include physicians licensed for limited institutional practice or physicians having a temporary license for residency training only.

2. Educational and/or experimental programs for physician's assistants operating beyond the physical confines of educational institutions in the medical sciences shall request approval of the Board of Medical Examiners before initiation. Applications shall contain such information as the Board may require but will, in every instance, (1) identify all presonnel (student, instructor, physician, etc.) involved; (2) specify the locations, facilities and purpose of such program; and (3) furnish job descriptions and duration of program.

3. The Board of Medical Examiners may, at its discretion, appoint an Advisory Committee which shall have the responsibility of advising the Board on (1) requirements for postgraduate education, continuing education, evaluation/re-evaluation and / or certification / re-certification of the competence of physician's trained assistants and (2) standards of educational programs for training physician's assistants. The Board may accept or reject any portions of such Committee reports at its discretion. The Committee shall be composed of a representative of the faculty of a physician's assistant education program, a physician's assistant graduate of an accepted program at a baccalaureate level, at least two members of the Board and any other individuals whose expertise the Board may find helpful.

4. A physician's assistant as defined in Rule One (b) must:

a. Clearly identify himself as an assistant to a physician by the display of an appropriate designation.

b. Function only under the direct supervision of a licensed physician. Independent health care by a physician's assistant shall not be permitted.

c. Be prepared to demonstrate, at the request of the Board, satisfactory ability to perform those tasks assigned to him by his employer-physician.

d. Pay such fees as are required by the Board for expenses incurred in the evaluation of his qualifications and his continuing performance.

SECTION IV
MEDICAL-DENTAL LIAISON COMMITTEE

This is a new committee of the OSMA, formed at the request of the Oklahoma State Dental Association. In early July the Executive Committee of that group requested establishment of a formal liaison committee. OSMA President, Ed Calhoon, M.D., named a six man committee made up of the OSMA President-elect, vice-president, immediate past-president, public relations chairman, medical school liaison chairman and OMPAC chairman.

The two associations agreed to meet quarterly and to alternate the committee chairmanship year by year. The President-elect of each association would serve as chairman or vice-chairman. The OSMA had the first chairmanship and the dental association's president-elect served as vice-chairman. It was recommended that the executive directors of the associations be included on the committee as ex-officio members.

During the first meeting various aspects of the relationship between the two professional groups were discussed in some depth. The need for a constant exchange of information on legislation, socio-economic affairs and medical center was stressed.

Joint activities in the area of group purchasing . . . such as insurance,

group travel and public relations . . . were discussed. It was felt that group travel and group insurance programs should be explored in some depth at a later time.

The areas where mutual interest was most pronounced were in political action and legislation.

SECTION V
MEDICAL-LEGAL RELATIONS COMMITTEE

On July 23rd-25th, 1970, the OSMA Medical-Legal Relations Committee in cooperation with the Oklahoma Bar Association's Committee on Medical Relations held a "Medical-Legal Institute" at Fountainhead State Lodge. Nearly 150 physicians and attorneys attended the meeting to participate in the three day program.

The purpose of the institute was to promote a closer "personal" relationship between the medical and legal professions; serve as a study in malpractice prevention for physicians and to aid attorneys in advising their physicians-clients; and, finally, to give both professions an opportunity to enter into a meaningful dialog on the problem areas existing between them.

The institute was actually planned during the 1969-70 Association fiscal year. Planning called for six joint meetings with the State Bar Association Committee. The joint committee had determined several years ago that the Medical-Legal Institute should be held no more often than every two years and that it should be self-sustaining so that it would not be a financial burden on either association. A registration fee was charged and the fee proved more than adequate to cover all expenses incurred. In fact, the joint committee has a $450 bank balance left to serve as seed money for the 1972 institute.

SECTION VI
MEDICINE AND RELIGION COMMITTEE

During early October this committee commenced planning on a seminar for physicians and clergymen to be held early in this year (1971). Unfortunately the committee was unable to arrange for the quality of speaker that it would like to have on such short notice. This necessitated moving the date for the seminar back to at least September of this year. Planning is proceding on this basis and the committee is continuing its search for a nationally known speaker that would appeal to both the clergy and medical professions. A two day seminar to be held on a given Friday afternoon and night and Saturday is planned.

SECTION VII
COMMITTEE ON OSTEOPATHY

During the 1970 annual meeting held in Oklahoma City the House of Delegates recommended that a committee be appointed to establish formal liaison with the Oklahoma Osteopathic Association. One of the requirements was that the committee should be free to enter into open discussion on any and all problems or areas of concern of either association. It was also required that formal relations should be established only if the Oklahoma Osteopathic Association was willing to give its counterpart committee the same latitude of discussion.

This recommendation was adopted after the House of Delegates heard a report that in April of last year, prior to the annual meeting, a meeting was held at the request of the Oklahoma Osteopathic Association. However, their Executive Secretary, Walter L. Gray, had specified that the meeting was "for the sole purpose of discussing the city-county hospital situation in Oklahoma." The recommendation calling for free and open discussion was to forestall the same limitation being placed on another joint meeting.

In November of last year the Osteopathic Association requested another joint meeting. Such a meeting was scheduled for January 24th of this year. However, on January 7th the Board of Trustees of the Osteopathic Association adopted a motion allowing their committee to enter into an open agenda meeting "with the stipulation that they will resist discussion of amalgamation or a composite examining board." This latter phrase was viewed as a severe limiting factor in any meeting.

It also became apparent that the Osteopaths were having an internal power struggle that seemed to be revolving around a joint meeting. At this point the association determined that the Osteopathic Association needed to work out its own problems before meeting with the Committee on Osteopathy and the meeting was cancelled.

It now appears that there has been a number of changes in the Osteopathic Association. Indications are that they will be willing to enter into free and open discussions in the near future.

SECTION VIII

Recommendations:

1. It is recommended that the Council on Professional and Intervocational Relations continue its liaison efforts with other professional and vocational organizations.

2. It is recommended that the Committee on Osteopathy continue its efforts at liaison with the Oklahoma Osteopathic Association. The committee should be free to enter into open discussion on any and all problems or areas of concern of either association. However, its main purpose should be to reach, if possible, mutually agreeable solutions to interprofessional problems. Any decision on possible policy changes will, of course, be taken to the OSMA Board of Trustees and House of Delegates.

Report of the
COUNCIL ON SOCIO-ECONOMIC ACTIVITIES
(APPROVED)

Council Members

B. C. Chatham, M.D., Chickasha, Chairman
Ann K. Kent, M.D., Muskogee
Richard W. Loy, M.D., Pawhuska
Roger Reid, M.D., Ardmore
James P. Bell, M.D., Oklahoma City
Mrs. E. C. Mohler, Ponca City
Thurman Shuller, M.D., McAlester
Robert Sukman, M.D., Oklahoma City
Walter E. Brown, M.D., Tulsa
Harold Stout, M.D., Waurika
Richard E. Carpenter, M.D., Oklahoma City
Arthur E. Schmidt, M.D., Oklahoma City
E. N. Lubin, M.D., Tulsa
Myra A. Peters, M.D., Tulsa
Arnold G. Nelson, M.D., Midwest City
Howard B. Keith, M.D., Shattuck

Occupational Medicine Committee

James P. Bell, M.D., Oklahoma City, Chairman
Robert R. Dugan, M.D., Oklahoma City
A. M. Mery, M.D., Bartlesville
Bob J. Rutledge, M.D., Oklahoma City
Kieffer D. Davis, M.D., Bartlesville
Frank Phelps, M.D., Tulsa

R. L. Lembke, M.D., Ponca City
Casper H. Smith, M.D., Duncan
W. W. Schottstaedt, M.D., Oklahoma City
Gifford H. Henry, M.D., Tulsa
J. Robert Dille, M.D., Oklahoma City
Mark A. Everett, M.D., Oklahoma City
Robert G. Perryman, M.D., Tulsa
Jack L. Richardson, M.D., Tulsa
James D. Green, M.D., Tulsa
C. J. Sternhagen, M.D., Oklahoma City
Samuel C. Jack, M.D., Lawton
James Berry Wise, M.D., Oklahoma City

Prepaid Medical Care Committee

Charles Bodine, M.D., Oklahoma City, Chairman
Richard W. Loy, M.D., Pawhuska
Neil B. Kimerer, M.D., Oklahoma City
William L. Parry, M.D., Oklahoma City
Joe E. Tyler, M.D., Tulsa
B. H. Gaston, M.D., Muskogee
Vernon M. Lockard, M.D., Bartlesville
Edward L. Moore, M.D., Tulsa
William J. Forest, M.D., Oklahoma City
Samuel R. Turner, M.D., Tulsa
Arthur E. Schmidt, M.D., Oklahoma City
Herbert Kent, M.D., Oklahoma City
Emil E. Palik, M.D., Tulsa
James W. Kelley, M.D., Tulsa
Richard G. Williams, M.D., Tulsa

Governmental Relations Committee

Robert Sukman, M.D., Oklahoma City, Chairman
Mark R. Johnson, M.D., Oklahoma City
Arnold G. Nelson, M.D., Midwest City
Ross Deputy, M.D., Clinton
Casper H. Smith, M.D., Duncan
Rayburne W. Goen, M.D., Tulsa
W. B. Renfrow, M.D., Oklahoma City
W. C. McCurdy, M.D., Purcell
Mrs. Alfred T. Baker, Durant
John A. Schilling, M.D., Oklahoma City
Oliver H. Patterson, M.D., Sapulpa
Jack D. Fetzer, M.D., Woodward
James W. Owen, M.D., Bartlesville
William J. Preston, M.D., Tulsa
George E. Merkley, M.D., Boise City
John H. Reynolds, M.D., Muskogee
Jack T. Terry, M.D., Ponca City

Medical Insurance Review Committee

Sub-Committee A

Charles R. Gibson, M.D., Chickasha, Chairman
David R. Brown, M.D., Oklahoma City
Robert J. Hogue, Jr., M.D., Guthrie
Leon D. Combs, M.D., Shawnee
George N. Beckloff, M.D., Stratford
Ceylon S. Lewis, M.D., Tulsa
Jack L. Richardson, M.D., Tulsa
Harold W. Calhoon, M.D., Tulsa
D. Kent Braden, M.D., Oklahoma City
Elmer Ridgeway, Jr., M.D., Oklahoma City
John W. Richardson, M.D., Oklahoma City

Sub-Committee B

Howard B. Keith, M.D., Shattuck, Chairman
Fred D. Switzer, M.D., McAlester
G. Rainey Williams, M.D., Oklahoma City
Alfred H. Bungardt, M.D., Tulsa
Frank L. Adelman, M.D., Enid
Edward L. Moore, M.D., Tulsa
James S. Williams, M.D., Bartlesville
Maurice Gephardt, M.D., Muskogee
Homer D. Hardy, Jr., M.D., Tulsa
Ross Deputy, M.D., Clinton
Leonard H. Brown, M.D., Tulsa

SECTION I

Council Activities

The purpose of the Council is to oversee the activities of the committees under its direction and, in addition, it may initiate projects of its own.

For the past several years, representatives of the council have been involved in the Oklahoma Health Economic Council (OHEC). One of the projects of OHEC was to create a "buyers guide" to assist Oklahomans in the selection of high-quality prepaid protection against the costs of illness. By doing so, it was thought, a well-protected public would be less inclined to support further government health care schemes.

The copy for a buyers guide was developed and approved by the House of Delegates with the instruction that the Council on Socio-Economic Activities be authorized to participate with Oklahoma Blue Shield and the Oklahoma Hospital Association in printing and distributing the guide (with the proviso that the OSMA financial contribution be governed by budgetary considerations as approved by the association's Board of Trustees).

Subsequently, Oklahoma Blue Shield offered to contribute an amount equal to the OSMA to offset printing costs, but it was learned that the Oklahoma Hospital Association would not likely participate. To do an effective job in reaching the public on a statewide basis it was estimated that 200,000 guides would be needed at a cost of some $10,000. Thus, the OSMA faced a potential outlay of about $5,000.

Meanwhile, it was learned that the American Medical Association was planning to produce and distribute a buyers guide on a nationwide basis.

With these factors in mind, the Council on Socio-Economic Activities voted on October 13th to request that Oklahoma Blue Shield consider printing the guide totally at its expense and to authorize Blue Shield to take credit for the publication if necessary.

Although there was some delay in transmitting the request to Blue Shield, the prepaid health care organization has the matter under consideration and may be favorably disposed toward shouldering the entire printing costs. However, Blue Shield officials believe the folder would be better accepted by the public if it was released under the auspices of the Oklahoma Health Economic Council.

SECTION II

Occupational Medicine Committee

During the summer of 1969 your committee established a volunteer panel of 50-60 physicians who were willing to review Workmens' Compensation cases for the Industrial Court, when in the opinion of the judges there was a divergence of medical opinion rendered. Due to punitive legislation and unjustified criticism the association severed its formal relationship with the court. However, with the consent of the volunteering physicians we offered the court the services of those physicians on an individual basis. In September of last year your committee surveyed the volunteer physicians to see how many cases had been referred by the judges. No affirmative replies were received. Apparently the "divergent medical testimony" problem is not a problem.

This year a bill to establish such

a medical panel by law has been introduced, its chances for passage are dim. In addition, other legislation has been proposed to permit an injured worker with a pre-existing disability or chronic illness to waive his compensable rights in order to be gainfully employed, again this bill is opposed by labor.

In the 32nd legislature your committee worked and helped secure passage of an act creating a Board of Health and Safety Compliance and Appeals, an Occupational Health and Safety Standards Commission and a Health and Safety Education and Training Division. Due to the change in administration, none of the boards or commissions have been appointed and it's unlikely that this law will make a significant impact on occupational health problems. Hopefully, as Oklahoma becomes more industrialized, government, labor and industry will recognize the need for more programs on safety and prevention and our own profession will become more aware of industrial disease and injury.

Your committee has maintained a continuous dialogue with representatives of labor and industry, unfortunately, we seem to accomplish little because these two groups find little on which to agree. We have requested and hopefully will have next year a session with representatives of these groups and Insurance representatives to see if new programs can be initiated. We also plan to survey our membership to determine their interest in occupational medicine and if sufficient interest is apparent, hold a seminar devoted to the subject.

There is still considerable pressure at the national level to adopt a uniform Workmen's compensation act, or establish federal standards to which each state must adhere. These proposals are being bitterly opposed by some and supported by others. Federal standards for workmen's compensation have the same hazards as uniform standards for health care.

Your committee chairman attended the AMA Congress on Occupational Health and we continue liaison with the AMA Department on Occupational Health.

Recommendations:

1. That the seminar on Occupational Medicine be conducted if sufficient interest is shown.
2. That liaison with Labor, Industry and Insurance representatives be continued.
3. The association continue to support occupational medicine legislation pending in the state legislature, specifically HB 1224 that creates a medical panel and HB 1225 that provides for a waiver of compensation.

SECTION III

Prepaid Medical Care Committee

This committee serves the function of liaison between the profession and the health insurance industry, principally with Oklahoma Blue Shield, since other carriers seldom bring problems to the committee for guidance.

However, during the past year, no formal requests were received, either from health insurance carriers or from members of the medical profession, for the consideration of the committee.

SECTION IV

Governmental Relations Committee

From July 1st, 1966 to July 1st, 1967 the methodology for paying all Medicare physician claims was that system employed by the Aetna Medicare Claims Administration. Although the Department of Public Welfare had used Title XIX funds to pay the Medicare premiums for Old Age Assistance Recipients, the charge data of Aetna was used in the processing of all claims.

However, the Department of Public Welfare was paying the coinsurance and the deductables for OAA-Medicare beneficiaries, and this brought about tremendous administrative problems of coordination between the two carriers since each organization was paying a portion of each claim. As a result, on July 1, 1967, the Department of Public Welfare began processing the basic Medicare claims for all Old Age Assistance beneficiaries.

Under this division of responsibility for Medicare administration, different methodology was developed by the two carriers for the processing of claims under the same program which was based on the "usual, customary and reasonable" fee concept. It wasn't long until the Oklahoma State Medical Association began receiving complaints from physicians that the two carriers, both operating under the same federal law and UCR regulations, were often paying different fees for the same medical service.

The differences in methodology were primarily differences in area location and differences in recognizing physicians according to their type of practice or specialty. In other words, the area designation employed by the two carriers was different, and this created a difference in prevailing charge data. Moreover, customary charge data for individual physicians differed because of variable methods of coding individual claims.

On at least two different occasions, representatives of the association appealed to the carriers to develop a uniform method to determine "usual, customary and reasonable" fees.

On April 7th, 1970, the two carriers met with representatives of the federal Bureau of Health Insurance to discuss the use of one uniform set of charge data. Federal officials felt it was necessary to adapt to a common methodology in order to be reasonably certain that identical services would be processed with the same allowable charge by both carriers.

The system employed by the Aetna Life and Casualty Company was selected by the Bureau of Health Insurance for use in both implementations of the Medicare law. Other meetings were held regarding the conversion to a common charge screen, and on January 1st, 1971 the Department of Public Welfare began using the Aetna system and data.

There have been instances since January 1st where allowable charges by the Department of Public Welfare were reduced as a result of using Aetna data. Conversely, there have been other instances where the Aetna allowable charge has been higher than the system previously employed by the welfare department. Increases primarily involve allowances for surgical procedures, and decreases generally have been in the area of hospital and office visits.

The two carriers are coordinating their efforts to effectively comply with the directive of the Bureau of Health Insurance. It is hoped that the conversion to a uniform methodology will eliminate the confusion of the past without any serious impositions on members of the Oklahoma State Medical Association.

SECTION V
Medical Insurance
Review Committee

Your association has maintained a peer review mechanism to adjudicate claims since July 1, 1966. In July, 1969, at the direction of the OSMA Board of Trustees, the organization and procedure of the medical insurance review committee was changed in order to accelerate the handling of cases. The new organization called for two subcommittees of ten members each, plus a chairman, to meet on alternate months.

We are now completing our second year of operation under the reorganization. During the past ten months, June, 1970 through March 1971, the two committees have heard 93 cases. Fifty-two cases involved Blue Shield, 21 involved the Department of Public Welfare, 8 were with Aetna-Medicare, 4 with Travelers Insurance Co., and the remainder involved only one case per company, with the last four cases being brought by physicians for personal advice.

The following is a statistical breakdown of the cases heard involving each of the major carriers:

Aetna-Medicare: A total of 7 cases were heard, but one of these involved only advice to Aetna. Six cases were decided in favor of the doctor while the committee upheld Aetna in one.

Department of Public Welfare: The Department brought 21 cases to the attention of the committee, but 7 of these were brought for advice only. Of the 14 cases brought involving actual fee disputes, 13 were settled in favor of the doctor, and the committee upheld the department's position in one.

Travelers: Travelers brought 4 UCR fee disputes to the committee, two were settled in favor of the physician and two in favor of the carrier.

Blue Shield: It should be noted that Blue Shield is the only carrier which presents a fee recommendation to the committee for consideration. In the 52 cases considered, the committee upheld the doctor's fee as charged 20 times, the carrier's recommended fee ten times, and in 22 instances compromised somewhere between the doctor's billed fee and the carriers' recommendation.

On several occasions your committee has counseled with physicians to enable them to work out difficulties with carriers or with their billing practices in general.

With the exception of cases involving physicians from Tulsa County, your committee is able to accept the case, hear it, and make the recommendation in 45 days at a maximum. At the request of the Tulsa County Medical Society Insurance Review Committee, they are given 30 additional days to hear each case. Therefore, a case involving a Tulsa doctor could take up to 75 days before final recommendation is made (It should be noted that even the Tulsa County cases are usually heard in much less than 75 days).

Your committee does not have any recommendations to make at this time. With the ever increasing possibility that a national peer review system will be imposed upon us, the committee feels that the association should remain as flexible as possible so that it can deal with rapidly changing circumstances.

Resolution No. 8
(DISAPPROVED — SUBSTITUTE POLICY STATEMENT)

SUBMITTED BY: Oklahoma County Medical Society

TITLE: Audit of Hospital Records

REFERRED TO: Reference Committee No. III

WHEREAS, the Department of Public Welfare of the State of Oklahoma has undertaken audits of patients' charts by lay employees of the Department in certain teaching hospitals in Oklahoma City, and perhaps elsewhere, to determine the actual participation of the physician in treatment of "service" patients under the Department's care, and

WHEREAS, physicians are wary of such audits being made since they do not constitute peer review, and

WHEREAS, it seems apparent that contractual agreement between the Department of Public Welfare and the hospitals so involved in the audit permit free and total perusal of charts and records with the permission of each patient

NOW, THEREFORE, BE IT RESOLVED that hospitals in the State of Oklahoma engaged in teaching and therefore caring for patients under the Department of Public Welfare program under Title XIX of the Medicare Law shall renegotiate the contracts. Such renegotiated contracts shall more specifically outline the procedure to be followed in such auditing with limitation of the amount of the charts and records made available to non-physician auditors and the phrase "with the consent of the attending physician" shall be included in such contractual arrangement.

NOW, THEREFORE, BE IT FURTHER RESOLVED that the Oklahoma State Medical Association and the individual medical staffs of private teaching hospitals of the State of Oklahoma so involved be on record as opposed to any further types of auditing, either for appropriateness of patient care or fees charged, these being a proper consideration only of such established peer review mechanisms as are functioning on hospital staffs and the appropriate peer review organization of the Oklahoma State Medical Association.

(SUBSTITUTE POLICY STATEMENT—APPROVED)

OSMA remains on record in opposition to other than clerical auditing by lay people.

The review of medical records regarding the appropriateness, medical necessity, quality of medical services or the appropriateness of fees remains a peer review function to be performed only by physicians who may refer to the OSMA peer review committee when indicated.

Resolution No. 13
(APPROVED AS AMENDED)

SUBMITTED BY: Robert Hogue, Jr., M.D.

TITLE: Relations with the Department of Public Welfare

REFERRED TO: Reference Committee No. II

WHEREAS, the 1970 House of Delegates of the Oklahoma State Medical Association unanimously passed a resolution requesting the President of our Association to contact the Governor of the State of Oklahoma in an effort to obtain a more equitable and cooperative arrangement with the Department of Public Welfare, and

WHEREAS, our President was unable to gain an audience with Governor Bartlett to even make such a request, and

WHEREAS, the Department of Public Welfare continues to flagrantly refuse to cooperate with the Okla-

homa State Medical Association Medical Insurance Review Committee and abide by its decisions, and

WHEREAS, the Department of Public Welfare continues to reduce physician's fees without rhyme or reason,

NOW, THEREFORE, BE IT RESOLVED that the President of the OSMA designate a committee to try to work out a solution to this problem and if at the end of the three month period this solution has not been found, the committee is directed to take this grievance to the Bureau of Health Insurance and our representatives in Congress in an effort to find a method to gain reasonable cooperation from the Department of Public Welfare.

Report of the
COUNCIL ON INSURANCE
(APPROVED)
Council Members

Jack D. Fetzer, M.D., Chairman
C. E. Woodard, M.D.
Robert W. Kahn, M.D.
William G. Bernhardt, M.D.
John P. Haddock, M.D.
William M. Leebron, M.D.
C. Alton Brown, M.D.
James B. Snow, M.D.
David D. Fried, M.D.
Myra A. Peters, M.D.
Warren G. Gwartney, M.D.
Max A. Glaze, M.D.
W. S. Dandridge, M.D.
Virgil Ray Forester, M.D.
Mrs. Forest D. Harris

SECTION I
DISABILITY INCOME PROGRAM

The disability income program is underwritten by the Insurance Company of North America and is administered by C. L. Frates and Company.

There are currently 698 members insured under the plan. The program allows a physician to select from a number of waiting periods and from a variety of monthly benefit ranges up to $1,200 per month (during the past year the Council on Insurance increased the maximum monthly benefit from $800 to $1,200). It also provides options as to the length of time benefits will be paid for disability due to sickness . . . three years, five years, or to age 65.

Since the inception of the program in 1961, $1,475,079.57 has been collected in premiums and $1,003,263.19 has been paid in claims or is reserved for losses. In 1970, paid claims and reserves appear to make it an unprofitable year for the company.

There have been no rate increases since 1961, a rather remarkable feature of the program which indicates its stability.

The Council on Insurance has tried over the years to adjust benefits upward to keep abreast of inflation, to provide broader benefits, and to maintain a stable premium. It is believed that the OSMA disability income program is competitive with other offerings made available to Oklahoma physicians.

SECTION II
OVERHEAD EXPENSE PROGRAM

This program is underwritten by the Continental Casualty Insurance Company through C. L. Frates. There are only 154 members of the association insured under this plan which has been available since 1962.

The program indemnifies physicians against the costs of keeping their offices open during periods of disability due to accident or illness. From $300 up to $1,500 a month coverage may be purchased for a disability period lasting 18 months. There are options for waiting periods before benefits begin, either 15 days or 30 days.

Premiums for this program are extremely competitive. Favorable loss experience has enabled the Council on Insurance to lower premiums by 20% since the inception of the program.

The premiums are tax deductable as a business expense.

SECTION III
PROFESSIONAL LIABILITY PROGRAM

The association's professional liability program ranks as one of the nation's finest. It is underwritten by the Pacific Employers Indemnity Company, a subsidiary of the Insurance Company of North America.

At a time when other state medical associations are having difficulty in finding coverage for their members at any price, the OSMA plan offers broad coverage with a strong company at approximately one-half the rates being charged by other companies doing business in Oklahoma.

The program has undergone only one rate increase in four years, and losses continue to be relatively favorable. For example, as of March 25, 1971, $2,072,115.59 has been collected in premiums since the inception of the program, but only $87,245.00 has actually been paid out in claims. However, the company has established reserves for possible losses of $454.950.00. Despite the high reserve figure the program remains financially stable and premium rates for 1971 remain the same.

Your Council on Insurance has carried out a claims prevention program by conducting educational courses on medical-legal matters at annual meetings and at county medical society meetings. In addition, a very informative professional liability booklet has been prepared for the benefit of OSMA members, copies of which have been distributed statewide and are still available through the association office.

The program features a contract between the association and the company which is unique to this type of insurance. The company is required by this contract to advise the association of all claims and reserves, thus making it possible at all times for the Council on Insurance to monitor the performance of the plan and to protect the membership against unwarranted premium increases. To protect against lost policies, the contract also provides that the company must periodically report to the OSMA the names of all insured physicians, the amounts of their conerages and their policy numbers. Precipitous premium increases are also averted by the terms of the contract, and cancellation of the program cannot be achieved without six months notice.

The Council on Insurance is continuing to negotiate with the company over one particular problem. Last year, the nation's casualty companies increased their loss development factor from two to four. This factor is a multiplier which is applied against reserves for pending or potential claims as an indicator of the company's actual exposure. Because the statute of limitations does not run on malpractice until "discovery" of alleged negligence, claims reported in any single year do not reflect the true hazard of experience (some cases do not materialize for as long as twenty years, and a five to seven year de-

lay is common). The loss development factor is multiplied against known reserves to take into account this "tail of the kite" situation, and losses thus developed are applied against the premium income to determine the need for premium increases. Thus, the industry's decision to double the loss development factor can materially affect the Oklahoma program.

Because the Council on Insurance believes that the malpractice climate in Oklahoma is much more favorable than the national average, the program administrator has been asked to negotiate with the company a factor which would be totally based on Oklahoma's loss experience. At this point, the company seems favorably inclined and we look forward to a reduction in our "losses" as might be influenced by a lower loss development factor.

Growth in enrollment in the program has been remarkable. At the present time, 1,504 members are participating in the OSMA-endorsed professional liability program.

SECTION IV
EXCESS LIMITS
LIABILITY PROGRAM

As a companion to the association's basic malpractice program, the OSMA has endorsed the Insurance Company of North America's "XIC" policy for those physicians who wish to carry their protection to very high limits of coverage.

This coverage requires basic malpractice protection of $100,000/$300,000, after which the XIC program will extend the protection to as high as $1,000,000. The XIC plan also provides excess limits protection on homeowners, auto, farmers personal liability, watercraft, aircraft, etc. (subject to having required basic liability protection for each peril).

XIC is recommended by the Council on Insurance as an economical way to achieve adequate protection during this period of excessively high damage suit awards. However, XIC is not mandatory with respect to the association's basic malpractice plan . . . a physician may elect to purchase his entire protection to high limits under the basic program.

Some 249 OSMA members are participating in XIC. Premiums in 1970 were $32,913. There have been no losses.

SECTION V
GROUP TERM LIFE INSURANCE

This program is underwritten by the Massachusetts Mutual Life Insurance Company through the Wilson and Wilson general agency.

Massachusetts Mutual has offered a group term life insurance program to OSMA members since 1956.

For the year ended March 31, 1971, life insurance protection was provided to 298 members. Premiums collected were $45,789 involving total life insurance at risk of $3,859,000.

During the past year, four claims have been paid at a cost of $41,099.87, and administrative costs bring total expenses to $46,099.87.

As a result of these figures, the claim experience for the year ended March 31st is approximately equal to the premiums collected.

Since the beginning of the program, $900,279 has been paid to the survivors of OSMA members. The program has run at a deficit as high as $150,758, but this accumulated deficit has been reduced in the last few years to a current $101,253 in arrears.

In an effort to lower the cost-per-thousand, to enroll more members, and to further reduce underwriting deficits, a new level group term life insurance program replaced the former plan effective April 1, 1971. The enlarged program provides for $50,000 of coverage prior to age 60, $25,000 from age 60 through 64, and $10,000 from age 65 through age 69. Accidental death benefits are included providing additional benefits of ($100,000) prior to age 60 (quadruple indemnity is provided for death on a common carrier). Also, the insured sums are payable in the event of dismemberment or loss of sight, and waiver of premiums due to disability is included in the program cost.

The Council on insurance feels the new program offers expanded benefits at a lower cost-per-thousand than the former plan. All physicians insured under the old program were offered the option of either converting to the new plan or retaining their existing coverage. Forty-two members elected the new coverage and twenty-three formerly uninsured members enrolled in the new program during the initial offering.

Report of the
COUNCIL ON PUBLIC HEALTH
(APPROVED AS MODIFIED BY
THE REFERENCE COMMITTEE)

Council Members

Hayden H. Donahue, M.D., Norman, Chairman
Paul A. Bischoff, M.D., Tulsa
Armond H. Start, M.D., Oklahoma City
Charles E. Smith, Jr., M.D., Oklahoma City
Wayne J. Boyd, M.D., Bartlesville
Raymond F. Hain, M.D., Oklahoma City
James B. Silman, M.D., Norman
Homer A. Ruprecht, M.D., Tulsa
Walter L. Honska, M.D., Stillwater
Carl D. Osborn, M.D., Ada
Thomas N. Lynn, M.D., Oklahoma City
Carl H. Guild, M.D., Bartlesville
Wolfgang K. Huber, M.D., Norman
Mrs. Richard Taliaferro, Ada
R. Leroy Carpenter, M.D., Oklahoma City

Committee on Alcoholism and Drug Abuse

Charles E. Smith, Jr., M.D., Oklahoma City, Chairman
John M. Moore, M.D., Pauls Valley
Frank Hladly, M.D., Tulsa
E. Edwin Fair, M.D., Ponca City
J. Hartwell Dunn, M.D., Oklahoma City
David D. Fried, M.D., Hollis
Dewey L. Mathews, M.D., Tonkawa
Eugene R. Flock, M.D., Weatherford
Omar J. Morgan, M.D., Tahlequah
William G. Husband, M.D., Elk City
Ray V. McIntyre, M.D., Kingfisher
Donald L. Cooper, M.D., Stillwater
Marcella Steele Ruprecht, M.D., Tulsa
Jack P. Enos, M.D., Yukon
David C. Mock, M.D., Oklahoma City
William A. Matthey, M.D., Lawton
Mrs. E. S. Kilpatrick, Elk City
Bryce H. Cockran, M.D., Midwest City
Robert D. Anspaugh, M.D., Oklahoma City
Alfred Hinkle, M.D., Alva
Floyd T. Hubbard, M.D., Henryetta
Fred T. Perry, M.D., Watonga

Disease Screening Committee

James B. Silman, M.D., Norman, Chairman
Ben I. Heller, M.D., Oklahoma City
John A. McIntyre, M.D., Enid
Jack M. Stephenson, M.D., Oklahoma City
R. Leroy Carpenter, M.D., Oklahoma City

Eugene Burgess, M.D., Oklahoma City
Theodore D. Benjegerdes, M.D., Alva
Adolph N. Vammen, M.D., Tulsa
Jerry L. Bressie, M.D., Oklahoma City
L. O. Short, M.D., Anadarko
W. R. Schmieding, Ph.D., Oklahoma City
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Richard B. Price, M.D., Oklahoma City
Camp S. Huntington, M.D., Bartlesville
H. W. Wendelken, M.D., Miami
Howard L. Puckett, M.D., Stillwater
Joe L. Spann, M.D., Tulsa
Samuel Sepkowitz, M.D., Oklahoma City

Committee on Immunization

Armond H. Start, M.D., Oklahoma City, Chairman
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Y. E. Parkhurst, M.D., Norman
Donald F. Robinson, M.D., Norman
Rex M. Graham, M.D., Miami
Burdge F. Green, M.D., Stilwell
Ralph W. Murphy, M.D., Ardmore
Mrs. Frank Howard, Shawnee
William L. Edwards, M.D., Duncan
William A. Mathey, M.D., Lawton
William H. Simon, M.D., Enid
Harris D. Riley, Jr., M.D., Oklahoma City
Robert L. Lembke, M.D., Ponca City
R. Leroy Carpenter, M.D., Oklahoma City

Committee on Laboratory Quality

Raymond F. Hain, M.D., Oklahoma City, Chairman
Eugene Bell, M.D., Tishomingo
James Todd, M.D., El Reno
Tom S. Gafford, M.D., Muskogee
F. R. Hassler, M.D., Oklahoma City
John F. DeJarnette, Jr., M.D., Ponca City
J. William Hood, M.D., Oklahoma City
Norman A. Cotner, M.D., Grove
Paul A. Leap, M.D., Enid
Byron Smith, M.D., Oklahoma City
William L. Hughes, M.D., Oklahoma City
Quillen M. Hughes, M.D., Del City
William R. Smith, M.D., Enid

Maternal Mortality Committee

Paul A. Bischoff, M.D., Tulsa, Chairman
Jed E. Goldberg, M.D., Tulsa
John W. Shackelford, M.D., Oklahoma City
James A. Merrill, M.D., Oklahoma City
Earl R. Muntz, M.D., Ada
Houston F. Mount, M.D., Tulsa
William R. Murphy, Jr., M.D., McAlester
J. R. McFarland, M.D., Bartlesville
William F. Crittendon, M.D., Norman
James W. Hampton, M.D., Oklahoma City
William Edwards, M.D., Duncan
Max Deardorff, M.D., Tulsa
Theodore Wenger, M.D., Tulsa

Council on Rural Health

William C. McCurdy, M.D., Purcell, Chairman
The Honorable Ernest Martin, Ardmore
The Honorable Wiley Sparkman, Grove
Mr. Ken Hagar, Oklahoma City
Tom Points, M.D., Oklahoma City
Mr. Jack Boyd, Oklahoma City
Dale Groom, M.D., Oklahoma City
Phil Smith, SC.D., Oklahoma City
Mr. Cleve Rodgers, Tulsa
Ed Young, M.D., El Reno
Roger Lienke, M.D., Oklahoma City
James L. Dennis, M.D., Oklahoma City
Mr. Walt Whitlow, Tulsa
Joe Duer, M.D., Woodward
Robert J. Hogue, Jr., M.D., Guthrie
Mr. Ken McFall, Oklahoma City
Thomas Rhea, M.D., Idabel
Jack Fetzer, M.D., Woodward
Ben Blackstock, Oklahoma City
Charles Tefertiller, M.D., Altus
Richard Stansberry, M.D., Oklahoma City
Ernest Shadid, M.D., Norman

SECTION I
INTRODUCTION

This council is responsible to the association for the activities of committees working in specific areas of public health. The council is fortunate to have committee chairmen who, along with their members, have experience and expertise in discharging their responsibilities. The following reports give details of each committee's activities.

In addition to committee work the council is faced with a sundry of problems with varying degrees of importance. Rather than itemize each of these, give a report and recommendations, we will review a few highlights.

The Oklahoma Interagency Council on Smoking and Health is in dire need of financial assistance. If the activities of this council are to continue the association may be called on for funding. A torrent of legislation is being passed at the national and state levels dealing with *Pollution and Environmental* control, these programs need the guidance of physicians and your council is actively seeking doctors with special interests in these subjects. *The White House Conference on Aging* will be conducted this year, your council will provide input for this meeting. A special committee has been appointed to deal with the growing number of programs for training *allied health personnel,* and specifically physicians' assistants. *Emergency medical services* and laws regulating ambulances will need special attention in the coming months. Even though *Drug Abuse* has already received considerable attention from the profession, government and the public, with the enactment of new laws, new emphasis will be necessary. The availability of *medical services in our rural areas* has achieved a state of national alarm. A program instituted by the Nixon Administration would provide Public Health Service physicians to work in needy areas. The Oklahoma Health Department in cooperation with others is investigating this program.

Your council will make every effort to keep abreast of these areas of concern and inform our members of the impact these activities will have on medicine. The many proposals dealing with National Health Insurance are subjects of other reports before this House of Delegates. Your Council Chairman has an ongoing liaison with groups studying these proposals and will keep the association informed.

SECTION II
COMMITTEE ON ALCOHOLISM AND DRUG ABUSE

During the past year your Committee on Alcoholism and Drug Abuse has conducted an extensive educational program among association members. The committee became aware that the drug abusing or drug intoxicated patient was becoming an all too frequent phenomenon in physician's offices and that few physicians had had an opportunity to study the various methods of handling such a patient.

The committee determined that even though the drug abuse problem was developing at an alarming rate, its first objective should be to aid the physician before launching any program for laymen. The com-

mittee's first project was to develop a "Drug Abuse Treatment Manual" for physicians. The second was to plan a number of seminars on the same subject to be given in various locations around the state.

The manual was published as an eighteen page booklet designed specifically to aid physicians in the proper diagnoses and treatment, on a short-term basis, of the drug intoxicated patient. Immediately after printing it was mailed to all OSMA members.

A series of six seminars on the same subject were organized. Four have already been held in Enid, McAlester (Krebs), Tulsa and Altus. Two more are scheduled: Lake Texoma State Lodge on Thursday evening, May 13 and Oklahoma City in June.

A registration fee has been charged at each of the seminars to help offset some of the expenses incurred. Although the program is not completely self-supporting, the registration fee has helped reduce the association's liability.

SECTION III
DISEASE SCREENING

For many years physicians have recognized the value of disease screening. Allied health agencies such as the Heart Association, Tuberculosis Association and various cancer groups have utilized screening techniques for early detection of disease. Not until automation and the computer, however, did the idea of multi-phasic screening emerge. The advantages of storing the results of periodic tests for comparison with previous results and also for comparison with "norms" are obvious. Unfortunately the cost of computers, the shortage of personnel and the lack of standardization have all contributed to limited use of multi-phasic screening programs.

This committee last year, worked with various groups, primarily the Health Department, to see if a multi-phasic screening program could be utilized in the physician's office. The committee was concerned about the practical aspects of such a program as well as its cost. A pilot project has been encouraging, it appears that a program for the physician's office can be developed that will be practical, useful and inexpensive and will not require a central registry or major center as once believed.

A multi-phasic screening program for office purposes will require well trained para-medical personnel and standardized forms. The committee chairman has reviewed several systems and envisions a model unit that can be adapted to the physician's office. Active physician participation will be required for multi-phasic screening to be useful and effective; however, the ultimate result can be an increase in efficiency by as much as 10% to 20%.

The committee plans to continue its research in this area with the idea of developing model systems for recommendation to the membership.

Recommendations:

1. That the activities of the committee be continued.
2. That members inform the association of mass screening programs being conducted in their araa.

SECTION IV
IMMUNIZATION COMMITTEE

The final chapter has been written on Oklahoma's "Rub Out Rubella" campaign. The mass immunization project cost in excess of $280,000 and resulted in protection for 307,243 Oklahoma children between ages 1-11. At the outset our goal was to achieve an immunity level of at least 50% in each county. This has been accomplished with three exceptions in the western part of the state. The overall state level is 62% — eighth highest in the United States. "Make up" clinics have been conducted in several counties during the past year in order to attain our goal.

The success of the campaign was almost the downfall of the committee, at one time we faced a $25,000 deficit with no more financial sources. Thanks to the efforts of the State Health Department, many volunteer workers and others, the debt has been erased.

Unfortunately other immunization programs are faltering. Last year your committee supported legislation that requires basic immunization as a condition for entry in the school system. The bill has been implemented, but the legislature failed to appropriate sufficient funds to purchase the necessary vaccines. The Health Departments' budget allocated only $16,000 for the purchase of these vaccines. Your chairman contacted the chairman of the Board of Health and requested a review of priorities and an additional $8,000 was made available. Even with this modest increase the program is woefully underfunded. We have already seen a potential outbreak of Rubeola in Oklahoma County and other outbreaks may occur. (The Oklahoma County outbreak was curtailed by a one day campaign, 8,971 children were immunized). The committee will continue to work for proper funding of a good statewide immunization program.

Your committee reviews and updates the Health Departments' recommended immunization schedule. After publication, copies are distributed to all association members.

Immunization levels for most of the preventable diseases are still high in most areas of the state. However the committee is concerned that physicians and the public are getting apathetic about epidemiological diseases, especially in our adult population. We encourage the members of the association to examine their practice procedures and make certain that routine immunizations are recommended for all patients.

Recommendations:

1. The House of Delegates supports the committee's effort to achieve a well-funded immunization program.
2. That every physician emphasize to his patients the importance of routine immunizations.

SECTION V
COMMITTEE ON LABORATORY QUALITY

For three years this committee has promoted a physicians' office laboratory evaluation program. In 1969 we had 25 labs enrolled, in 1970 we had 76 in either the Basic Survey or PEP Program. For next year we have 73 labs enrolled in the Peer Evaluation Program and an unknown number enrolled in the Basic Survey Program. This is an outstanding enrollment. Oklahoma has the largest percentage of its physician population enrolled in laboratory survey programs.

The Peer Evaluation Program prepared for the College of American Pathologists and approved by the committee provides the physicians office laboratory with four sets of check samples a year, each containing specimens for as many as 19 tests. The test results are computer-

A COMPARISON OF PERFORMANCE FOR LABORATORIES ENROLLED IN PEP PROGRAMS FOR 1969-1970 ON SELECTED CONSTITUENTS

Constituent	Number Values Reported		Percent Technically Acceptable		Percent Technically Unacceptable		Percent Medically Misleading	
	1969	1970	1969	1970	1969	1970	1969	1970
Glucose	180	476	79%	83%	21%	17%	6.7	9.8
Bilirubin	128	302	76%	91%	24%	9%	1.6	3.3
Cholesterol	168	423	83%	96%	17%	4%	1.8	2.1
Urea Nitrogen	156	355	82%	81%	18%	19%	3.2	8.2
Uric Acid	162	347	77%	84%	23%	16%	10.5	10.6
Hemoglobin	178	470	82%	92%	18%	8%	2.2	2.1
TOTALS	972	2373	80%	88.1%	20%	11.9%	4.4	5.9

ized, evaluated by comparison with "Norms" and the participating physician receives printouts detailing his labs' performance. An anonymous copy of the test results are forwarded to our committee and are evaluated by "clinicians." We summarize the results and write a critique on each set of results. The summary along with comments is sent to the enrolled labs. The comparative analysis permits the physician to evaluate his performance in relation to other participating labs.

Our committee feels that voluntary participation in a laboratory survey program is one way to "thwart" third party intervention into the policing of physicians' offices. The association now has the data to counter any criticism of lab performance by practicing physicians. This isn't to say that all lab performance is excellent — but through this system of evaluation we are able to identify problem areas and promptly notify the participating lab.

Above is a summary comparing the 1969 performance with the 1970 performance on selected constituents.

This comparison reveals a significant improvement in the percentage of technically acceptable values reported. The average of 88% is considerably better than the 80% of 1969. Unfortunately the reverse is true of the medically misleading values. The committee feels there are several reasons for this performance.

1. The tremendous increase in the number of labs reporting, 76 as compared with 25 in 1969.

2. Some of the participating labs had not been in a survey program before and the first time results were considerably outside the acceptable perimeter.

Other comparison are not conclusive. Seven representative labs were chosen to compare their '70 performance with '69 to see if there was improvement, in 4 cases the labs did better, in 1 case there was no significant change, and in 2 cases the results were worse. The committee feels that since the 1969 survey was different from the 1970 survey that the comparison may not be statisically valid.

There is sufficient evidence to support the committee's contention, that a survey program alone will not considerably improve the quality of laboratory services in the physician's office. A Laboratory Quality Control Program with sufficient education is necessary for consistent improvement. The committee plans to conduct seminars next year if there is sufficient interest and will concentrate on those areas that are creating the biggest problem. (A seminar was planned this year but advance enrollment was inadequate to justify conducting the program.)

The committee would like to remind this body that Oklahoma is far ahead of any state in the nation in laboratory survey programs for its physicians, however the possibility of legislation requiring minimum standards for physicians' office labs is not without precedent. Two states—California and Arizona have such legislation. It is our hope that the committee's activities will forestall legislative efforts and we encourage all members who do lab work in their offices to consider the committee's program.

Recommendation:

1. That the committee's activities be approved and continued.

SECTION VI
MATERNAL MORTALITY COMMITTEE

Since 1942 the Medical Association has cooperated in studying maternal deaths in Oklahoma for the purpose of providing objective review for the attending physician. Case histories of each maternal death are requested on a voluntary basis from the attending physician and his consultants. The committee reviews the case anonymously, (names etc. are eliminated) and submits a report to the physician involved. The purpose of the review is to assess the cause of death and determine if it was preventable.

The maternal death rate in Oklahoma is comparatively low; the average over the past five years has been only 2.9 deaths per 10,000 live births. The national average is 2.9.

During the period 1965-1969 there were 60 maternal deaths — 76.6% of the questionnaires were completed and 42 of the 46 cases were determined to be deaths of an obstetrical nature. Of the 42 cases studied 27 may have been preventable. The most prevalent cause of death was sepsis and hemmorrhage—17 cases. The committee plans an in depth article for *The Journal* to discuss causes of death.

While the response of physicians to the committee's request is good (76.6), the committee feels that all physicians should respond. The results of the study are strictly confidential and for educational purposes only. Had we been able to prevent the potentially preventable deaths, maternal mortality rate for the 5 year period (1965-1969) would have been 1.0.

The committee wishes to thank the physicians who have cooperated and encourage all others to respond when asked.

SECTION VII
COUNCIL ON RURAL HEALTH

The recently completed census reveals some alarming facts about the health care problems of our rural areas. 39 counties in the state lost population in the last 10 years at an average rate of 8.3%. However, in the same decade the physician population in communities of under 5000 dwindled to 239 or a loss of 33%. The problem is obviously critical. This council is trying to find ways to encourage physicians to go to our rural areas, or to find new ways of delivering health care to our smaller communities. The council has retained Kelly West, M.D., O.U.

Medical Center, to conduct a survey in the Southeastern part of the state in an effort to analyze existing medical resources and assess future needs. This survey will be utilized to develop criteria for future surveys if it proves successful and is financially feasible. We hope to be able to define a medical service area, determine its needs and ideally find solutions to those needs. The Council has no hopes of furnishing all small towns in Oklahoma with physicians. In fact we acknowledge that it is not only impossible but impractical. We do hope to find areas of the state with a shortage of medical manpower that can be attractive practice opportunities. We recognize that to attract physicians to these areas will require support from outside the medical community and have included on the council representatives of other organizations.

The grant programs established by the State Legislature and the Association will produce medical graduates who have a commitment to practice in needy areas. The state legislature is increasing its appropriation to $50,000 which will finance 10-12 students. Hopefully the association's Foundation for Medical Care will attract additional funds and will be able to finance a comparable number.

A recent survey conducted by OSMA revealed 165 practice opportunities in the state. Not all would be considered critical areas but as you can see an additional 15 to 20 physicians per year for our rural areas would make a significant impact. The real problem will be to keep the physician in the location after he has fulfilled his commitment. Dr. West's survey will hopefully give us an idea of the characteristics essential to a successful rural practice and graduates will be encouraged to go to these areas.

We are also aware that competent help for the rural physician will be a problem and the council is studying closely the programs that are training physician's assistants. Exactly how these medical personnel will fit into rural practice is speculative, but it appears that their training will enable them to relieve the physician of some of his lesser tasks. The Board of Medical Examiners has adopted rules regarding the Physician's Assistant and they are listed in the report of the committee on Health Related Professions — Council on Professional and Intervocational Relations.

Last year when we wrote this report, we stated that the work of this council would take a long time. In that year there have been considerable accomplishments — seven students are in school that have signed commitments to practice in rural areas; your association has created a foundation for financing similar students; a comprehensive survey of one section of the state is being conducted. There is still much to be done but we are making progress.

Recommendation:

1. That the Association membership continue to support the work of this council.

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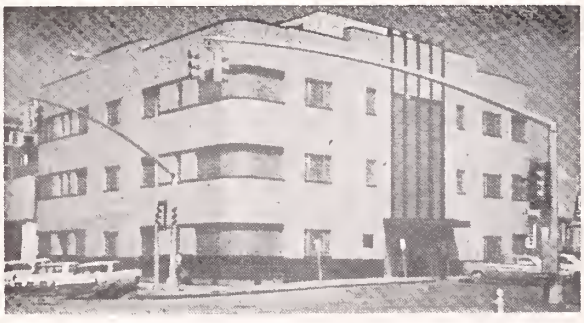
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The JOURNAL *of the Oklahoma State Medical Association*

DEADLINES

October Issue

Editorial, Scientific, Book Reviews	August 15, 1971
Advertising Copy	September 15, 1971
News Copy, Miscellaneous Ads	October 1, 1971

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Articles accepted for publication, including manuscripts of annual meeting papers, are the sole property of *The Journal* and must not have been published elsewhere. Authority for approval of all contributions rests with the Editorial Board, and the Board reserves the right to edit any material submitted. Manuscripts should be typewritten, double spaced and submitted in original and one copy. Receipt of manuscripts will be acknowledged and unused manuscripts returned. Used manuscripts will be returned on request. *The Journal of the Oklahoma State Medical Association* is not responsible for the statements or opinions of any contributor.

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Members of the Oklahoma State Medical Association, the constituent societies of the association, and all readers in general are invited to supply news items of general interest to the profession.

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All advertising copy must be approved by the Editorial Board before acceptance for publication. General and miscellaneous advertising rates will be sent on request.

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Authors will receive reprint order forms from the Transcript Press, P.O. Drawer 1058, Norman, Oklahoma 73069, prior to final publication of their articles. Other requests for reprints must be made to the Transcript Press within 30 days after publication.

BACK ISSUES

Microfilm copies of back issues of *The Journal* may now be purchased from University Microfilms, 300 North Zeeb Road, Ann Arbor, Michigan 48106.

"The most powerful lobby" has often been used to describe the AMA's legislative efforts in Washington. However, a recent issue of Congressional Quarterly listed the 15 top lobbies in 1969 and the AMA ranked number 14 with an expenditure of $91,355. Above the AMA expenditures were such organizations as the American Legion, Council for a Liveable World, United States Savings and Loan League, and the American Farm Bureau Federation. Four of the top five slots were taken up by portions of the AFL-CIO. Top money spender was the National Association of Letter Carriers (AFL-CIO) at $295,970. They were followed closely by the United Federation of Postal Clerks (AFL-CIO) spending $250,827. Fourth down the line was the AFL-CIO headquarters with an expenditure of $184,938. Some quick addition reveals that the AFL-CIO, using its various member unions as fronts managed to spend nearly three quarters of a million dollars in lobby efforts in 1969.

How important is health, and how interested is Congress? Last year, nearly one congressional bill in every ten—or about 2,300 bills—had health or medical implications. The political importance of health and medical issues can't be overlooked at the state level. The OSMA's lobbyist, David Bickham, has had to keep tabs on 65 different bills in the state legislature so far this year.

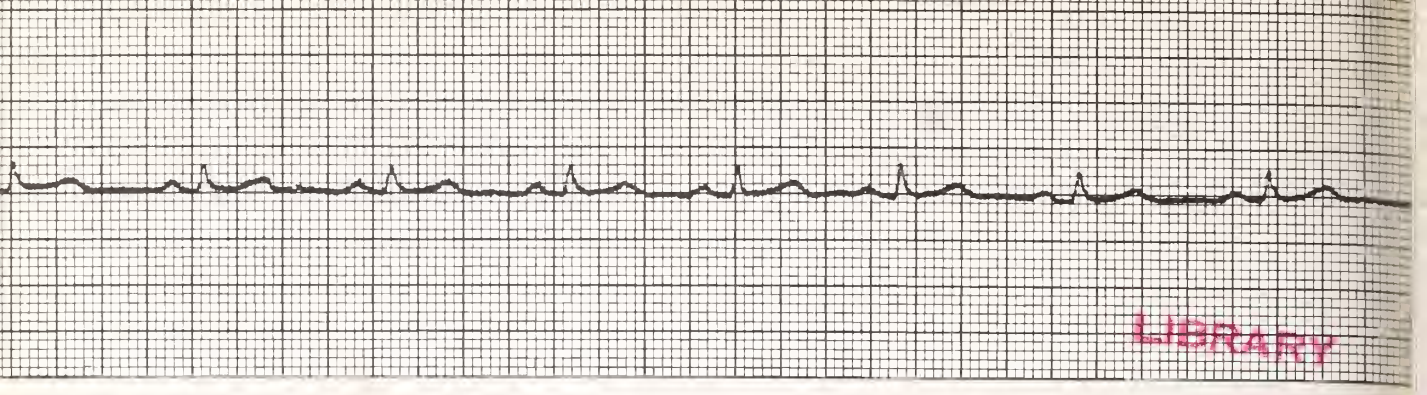
Internal Revenue Service has completed its study of tax returns filed by physicians, dentists and other health care providers who received $25,000 or more during 1968 under Medicare and Medicaid. In a press release, IRS said 83 percent reported their receipts correctly. Of those who erred in their returns, 15 percent under reported receipts by an average of $7,700 and two percent over reported by an average of $16,000. On an overall basis, 99 percent of actual receipts and 97 percent of net profits were reported correctly according to the IRS. However they pointed out that errors of all kinds resulted in tax deficiencies on more than half of the returns examined. The exact number of returns examined was not disclosed in the press release. The *Wall Street Journal* put the number at "about 8,400."

OSMA JOURNAL / *the last word*

Authority to establish mandatory continuing education requirements for physicians licensed in New Mexico has been granted to the state's Board of Medical Examiners. The proposal had been supported by the New Mexico Medical Society. If the Board decides to establish such requirements, the new law states that the Board "shall recognize and give weight to existing educational methods, procedures, devices in use among the various medical specialties and other recognized medical groups . . ." The Board "shall not establish and enforce such requirements if they will reduce the availability of physicians in a community to an extent that adequate care is jeopardized." New Mexico is the second state to provide such authority to its Board of Medical Examiners. Kansas has given its Board such power, but it has never been invoked.

Officials of a major union are reportedly disconcerted by the results of a poll conducted among its members on their reactions to various national health insurance proposals. A source said tabulation of the poll results reveal 40 percent of the union members opposed Senator Edward Kennedy's bill for a federally controlled health care system. The reason given, in most instances, was that it was "too expensive." Tabulation of the entire poll, and the name of the union, is expected to be released sometime in late June.

Amphetamines would be treated as narcotics under a Justice Department proposal aimed at limiting the production of these drugs in their prescribed uses. The proposal would require more detailed record keeping on the part of the physicians, pharmacists and hospitals. It calls for re-classification of amphetamines and methamphetamines and regulating the narcotics since they carry potential for "severe psychological dependence" with "serious danger" to abusers. □



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